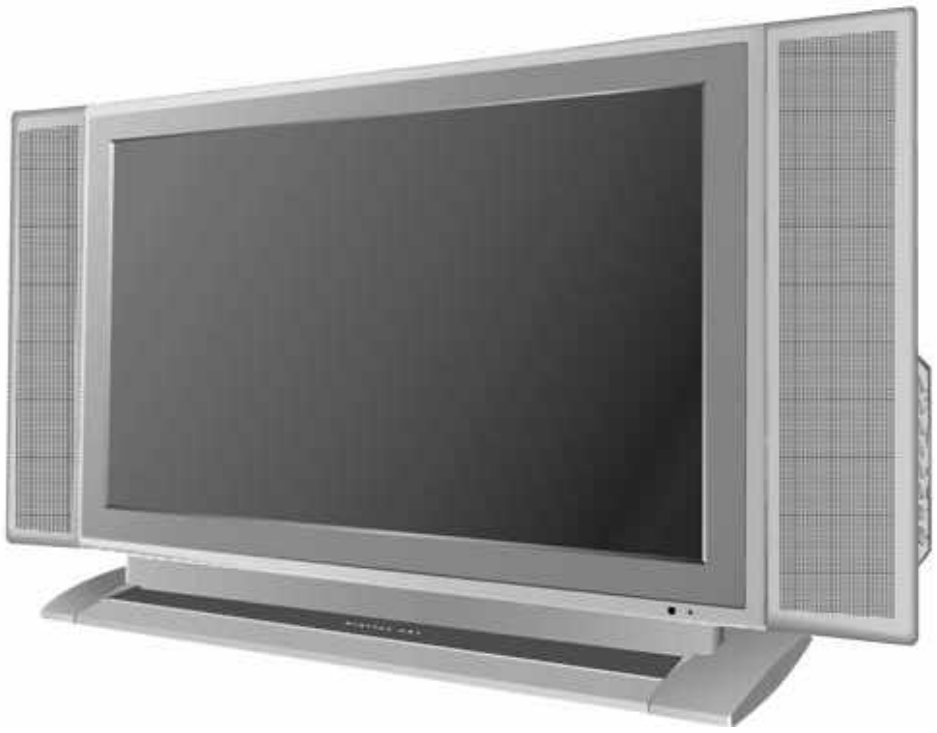
Service Manual

26inch

LCD TV

Liquid Crystal Display



MODEL NAME	DOCUMENT NO	REVISION NO	REVISION DATE	PAGE
ELT-2600AP	RD(1)	00	04/04/02	1/57

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SPECIFICATIONS

Note : Specification and others are subject to change without notice for improvement.

● **TV**

1.Input Signal :

PAL
SECAM
SD,HD
VGA ~SXGA

2. Tuner : PAL
SECAM

2. Input Voltage : AC 100V ~ 240V, @ 50/60Hz, 2A

3. Power Consumption : 140W
Stand-by : 5W

4. LCD Module : LTA260W1 - ### (SEC)

5. Speaker Impedance : 8Ω

6. Sound Output : 7W + 7W (Max)

7. Feature :

- AV Input
- Component1 Input (DVD)
- Component2 Input (DTV)
- D-SUB (Analog RGB 15 pin)
- S-Video Input
- Composite Input
- SCART1 Input (Full)
- SCART2 Input (Half)
- Tuner (PAL,SECAM)
- Audio Input (Composite, Component 1/2, S-Video, PC)
- RS-232C (9 pin), TCP / IP Support (0~254set)

8. Function :

- ARC
- PIP
- PBP (4:3,16:9)
- MTS
- TTX

9. External Interface

1) AV / COMPONENT Output

ITEM	MIN	TYP	MAX	UNIT
AV Video Input Level	0.85	1.00	1.15	Vpp
AV Sync Input Level	0.24	0.29	0.32	Vpp
AV Burst Input Level	0.14	0.28	0.35	Vpp
AV Video Input Level	0.47	0.63	0.79	V
AV Audio Input L/R	0.47	0.63	0.79	V
Component Video Input Level (Y,Cb/Pb,Cr/Pr)	0.6	0.7	0.8	Vpp
Analog RGB, H/V Input Level	0.6	0.7	0.8	Vpp

2) COMPONENT Mode (Y,Cb/Pb,Cr/Pr)

RESOLUTION	H-Freq(KHz)	V-Freq(Hz)	Proposed
720*480	15.73	60.00	SDTV,DVD 480i
720*576	15.63	50.00	SDTV,DVD 576i
720*480	31.47	59.94	SDTV 480p
1280*720	45.00	60.00	HDTV 720p
1280*720	44.96	59.94	HDTV 720p
1920*1080	33.75	60.00	HDTV 1080i
1920*1080	33.72	59.94	HDTV 1080i

3) SUPPORTING DISPLAY Mode

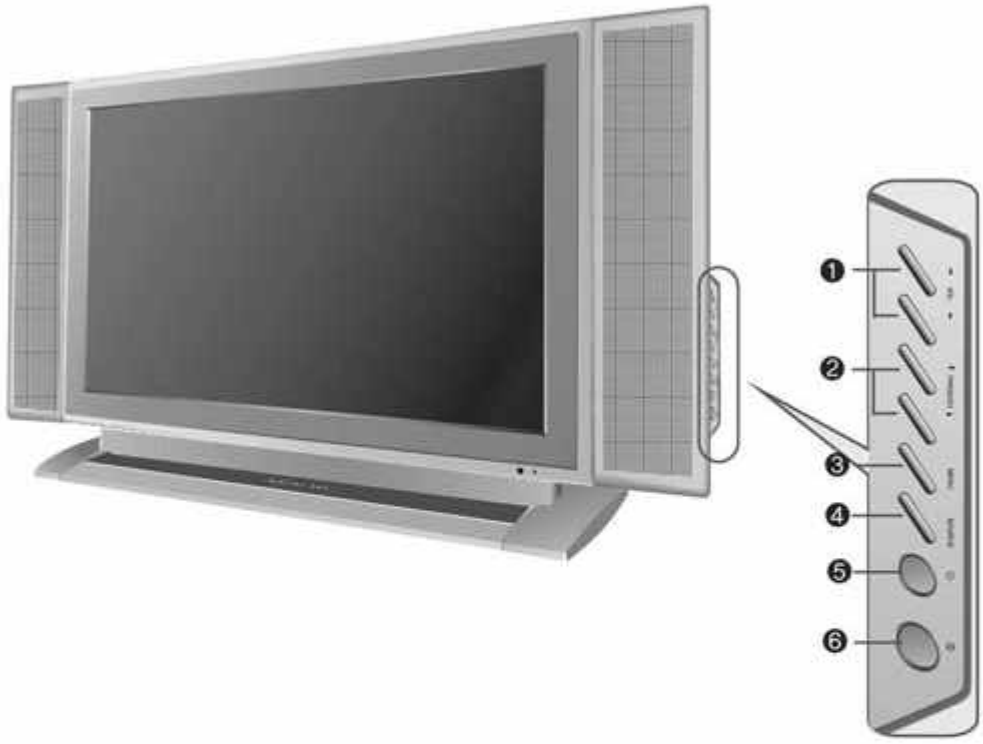
RESOLUTION	H-Freq(KHz)	V-Freq(Hz)
640*480	31,47	60
	37.86	72
	37.50	75
720*400	31.47	70
800*600	35.15	56
	37.88	60
	48.88	72
	46.88	75
1024*768	48.36	60
	56,48	70
	60.02	75
1280*1024	64.00	60

10. RS-232C Signal

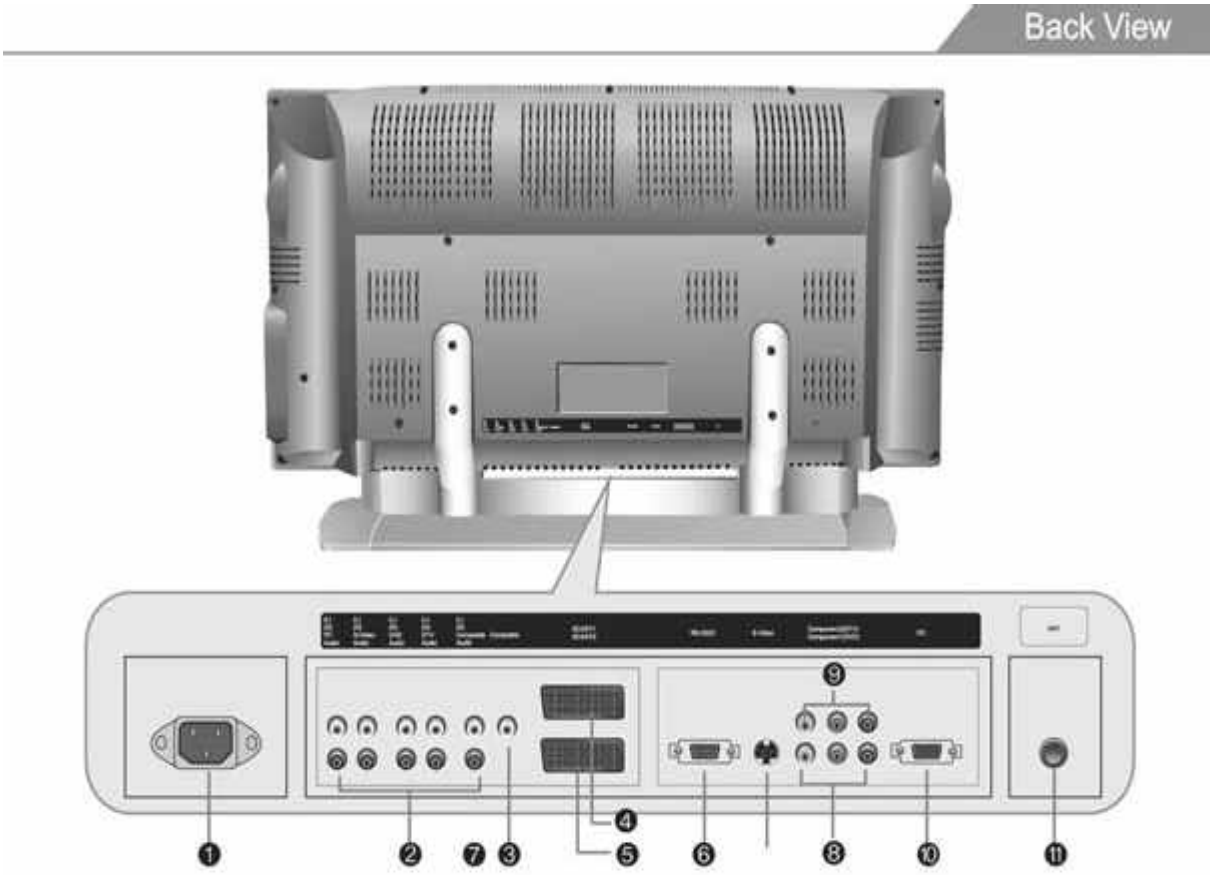
Pin No	Pin Name	Spec	Pin No	Pin Name	Spec
1	DCD	NC	6	DSR	NC
2	RXD	12 Vpp	7	RTS	NC
3	TXD	12 Vpp	8	CTS	NC
4	DTR	NC	9	R	NC
5	GND	GND			

CONTROL DESCRIPTIONS

Front View



1. VOLUME Button : VOLUME -, + Button
2. PROG/ CH : PROGRAM/ Channel -, + Button
3. MENU Button : OSD MENU Display Button
4. Source/ Select Button : TV, SCART 1, SCART 2, Composite, S-Video, Component 1 (DVD), Component 2 (DTV), PC, Select Button
5. Standby Button
6. Main Power Button : Please turn off the main power switch, if the LCD TV will not be used for a long period of time

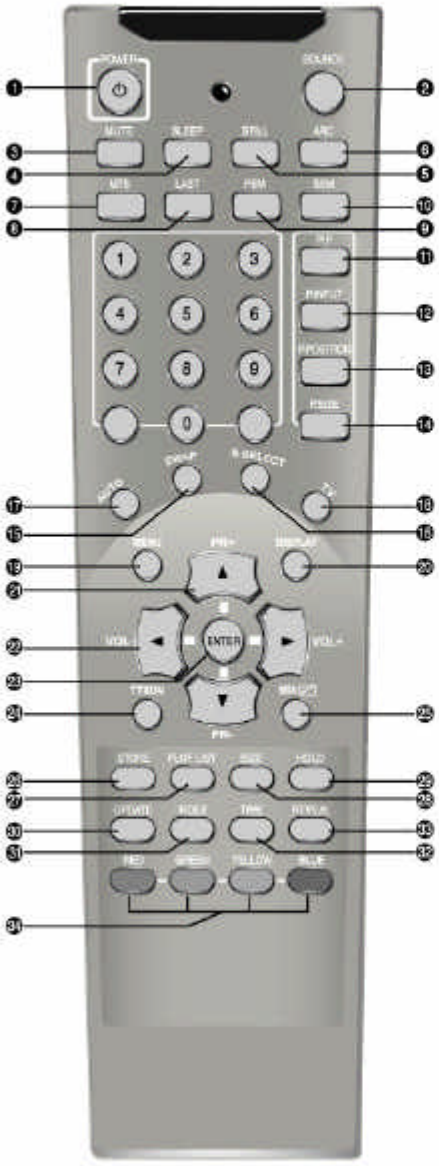


❶ AC Input
❷ Audio Input (PC, S-Video, DVD, DTV, Composite)
❸ AV Input (Composite)
❹ SCART 1 (Full SCART)
❺ SCART 2 (Half SCART)
❻ RS-232C
❼ S-Video Input
❽ Component 1 (DVD) Input 480i~576i
❾ Component 2 (DTV) Input 480p~1080i
❿ RGB PC Input [VGA~SXGA (60Hz)]
⓫ Antenna (RF) Input

REMOTE CONTROL BUTTONS

● Functions of remote control buttons

The remote control is using Infra-Red (IR). Point it towards the front of the LCD TV. The remote control may not work correctly if it is operated out of range or out of angle.



1. POWER : TURNS THE TV ON AND OFF(page.18)
2. SOURCE : USE TO SELECT AN INPUT SOURCE (page.20)
3. MUTE : PRESS TO TEMPORARILY CUT OFF THE SOUND (page.19)
4. SLEEP : PRESS TO SELECT A TIME FOR THE TV TO TURN OFF AUTOMATICALLY (page.37)
5. STILL : PRESS TO STOP THE ACTION DURING A PARTICULAR SCENE (page.31)
6. ARC (Aspect Ratio Control) : PRESS TO CHANGE THE SCREEN SIZE (page.27)
7. MTS (Multi-Television Sound) : PRESS TO SELECT MONO OR STEREO MODE (page.34)
8. LAST : TURNS TO THE PREVIOUS PROGRAM (page.19)
9. PSM : PICTURE STATUS MEMORY KEY (page.23) (CUSTOM, DYNAMIC, STANDARD, MOVIE, MILD)
10. SSM : SOUND STATUS MEMORY KEY (page.24) (CUSTOM, STANDARD, MUSIC, MOVIE, SPEECH)

◉PIP CONTROL KEY (page 32, 33)

11. PIP : PIP ON/OFF
12. P.INPUT : PIP INPUT SELECT KEY
13. P.POSITION : PIP POSITION CONTROL KEY
14. P.SIZE : PIP AND PBP MODE CHANGE
15. SWAP : PIP SOURCE SWAP
16. S.SELECT : SOUND SWAP KEY

17. AUTO(AUTO IN PROGRESS) : IN PC MODE, PRESS TO CONTROL THE MONITOR SCREEN AUTOMATICALLY
18. TV : TV INPUT SOURCE SELECT KEY
19. MENU : DISPLAYS THE MAIN ON-SCREEN MENU
20. DISPLAY : PRESS TO DISPLAY THE CURRENT PROGRAM AND AUDIO/ VIDEO SETTINGS (page.19)
21. ▲,▼ (PR+, PR-) : PROGRAM, MENU CONTROL OR PAGE UP AND DOWN KEY, STAND BY ON
22. ◀,▶ (VOL-, VOL+) : PRESS TO INCREASE OR DECREASE THE VOLUME OR MENU CONTROL KEY
23. ENTER : SAVE THE VALUE

◉TELETEXT CONTROL KEY (page 38)

24. TTXON : TELETEXT KEY
25. MIX : MIX WITH TV SCREEN
26. STORE : STORE THE USER DEFINED FAVORITE PAGE
27. FLOF LIST : EXCHANGE FLOF/LIST MODE
28. SIZE : TELE TEXT SCREEN SIZE KEY
29. HOLD : HOLD FUNCTION DURING TELETEXT DISPLAY
30. UPDATE : DISPLAY CANCEL OR TEXT UPDATE KEY
31. INDEX : TEXT INDEX KEY
32. TIME : SUBPAGE DISPLAY MODE KEY
33. REVEAL : SELECT HIDDEN CONTENT DURING TELETEXT DISPLAY
34. RED, GREEN, YELLOW, BLUE : DIRECT ACCESS TELETEXT LINKED PAGE KEY

■ TELETEXT FUNCTION

Basic Function

■ TEXT On/Off

1. Press "TTX ON" once , then displays the Teletext pages.
2. If you press "TTX ON" once more, Text mode is off.

■ TOP TEXT

The user guide displays four fields-red, green, yellow and blue at the bottom of the screen. The yellow field denotes the next group and the blue field indicates the next block.

- Group/Block/Page selection

1. With the blue button you can progress block to block.
2. Use the Yellow button to proceed to the next group with automatic overflow to the next block.
3. With the Green button you can proceed to the next existing page with automatic overflow to the next group.
4. The RED button permits to return to previous selection.

■ FLOF TEXT

The teletext pages are colour coded along the bottom of the screen and are selected by pressing the corresponding coloured button.

- Page selection

1. Press the Index button to select the index page.
2. You can select the pages, which are colour coded along the bottom line with the same coloured buttons.

Special Teletext Function key

■ MIX : In the mix mode display, the underlying video and the teletext page display are both simultaneously visible on the screen. This command turns the display to mix mode and is enabled only in the text mode.

■ STORE : This command stores the user defined favorite pages. This command is enabled only if the list mode is active.

■ FLOF LIST : This command toggles between list mode and current. Text mode(FLOF, TOP or normal)

■ SIZE : Toggle the display page size between double-size top, double-size bottom and normal.

■ HOLD : The update of the current display page is halted so that the content will not be changed.

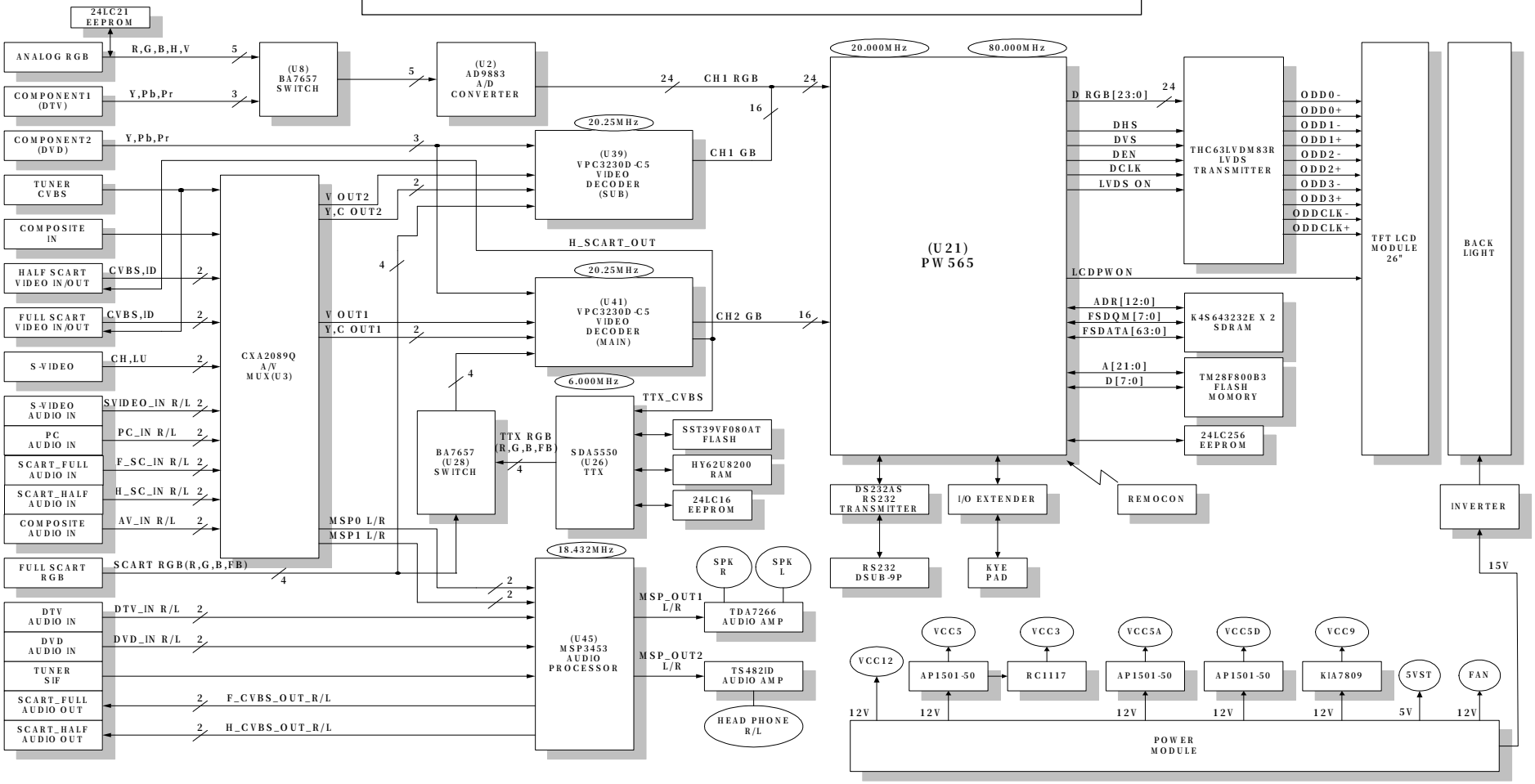
■ UPDATE : Press this button to view the updated teletext page.

■ INDEX : Return to the index page.

■ TIME : In TV mode this command makes clock display at right-top corner.
In TEXT mode if this command is given the sub page mode is activated.

■ REVEAL : Press this button to display the concealed information. Such as solutions of riddles or puzzles.
RED, GREEN, YELLOW, BLUE-In the TOP/FLOF automatic navigation mode, these keys select and display the linked page.

26" LCD TV PAL PW565 BLOCK DIAGRAM



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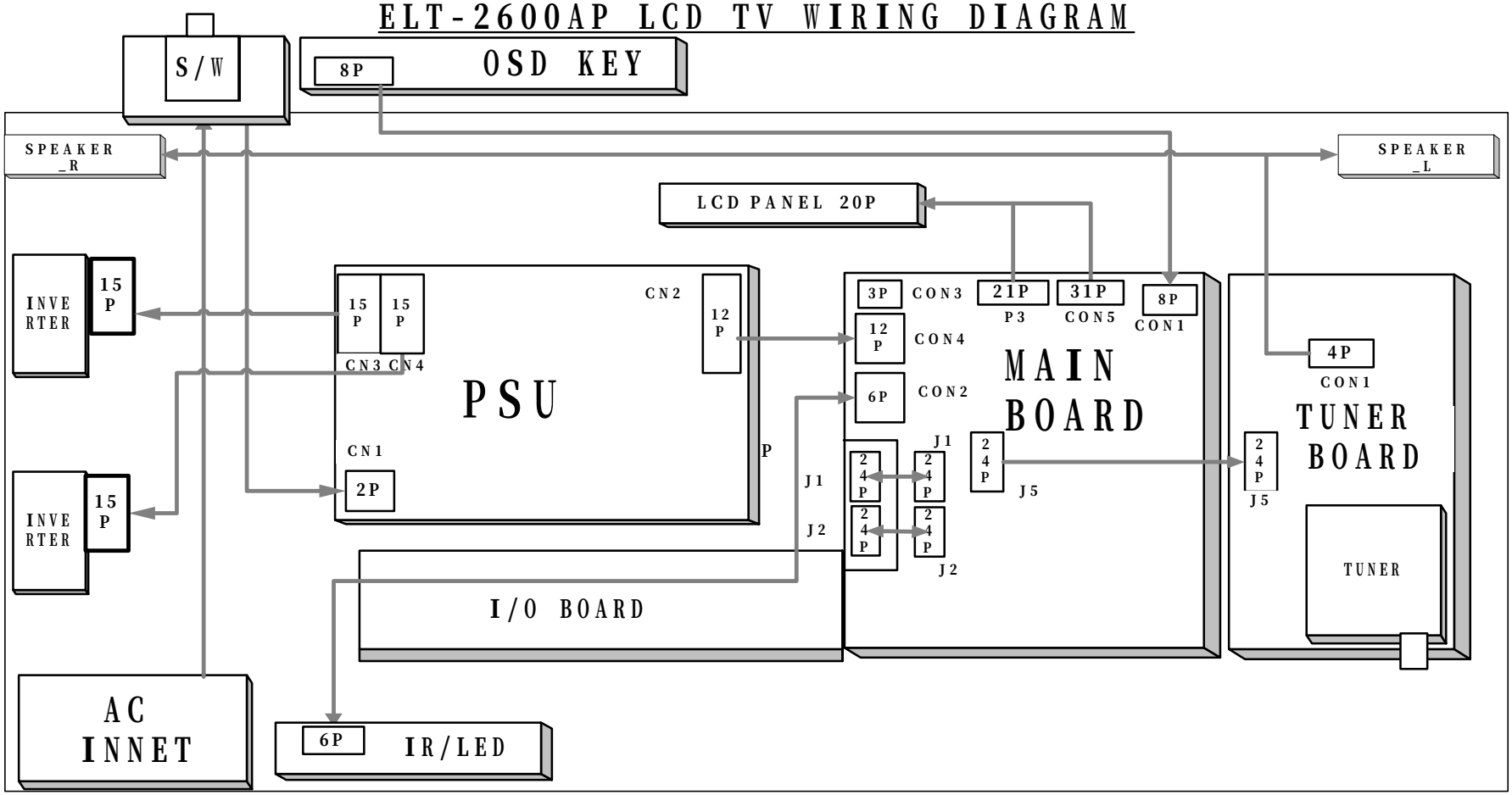
ELT-2600AP LCD TV WIRING DIAGRAM



MODEL NAME	DOCUMENT NO	REVISION NO	REVISION DATE	PAGE
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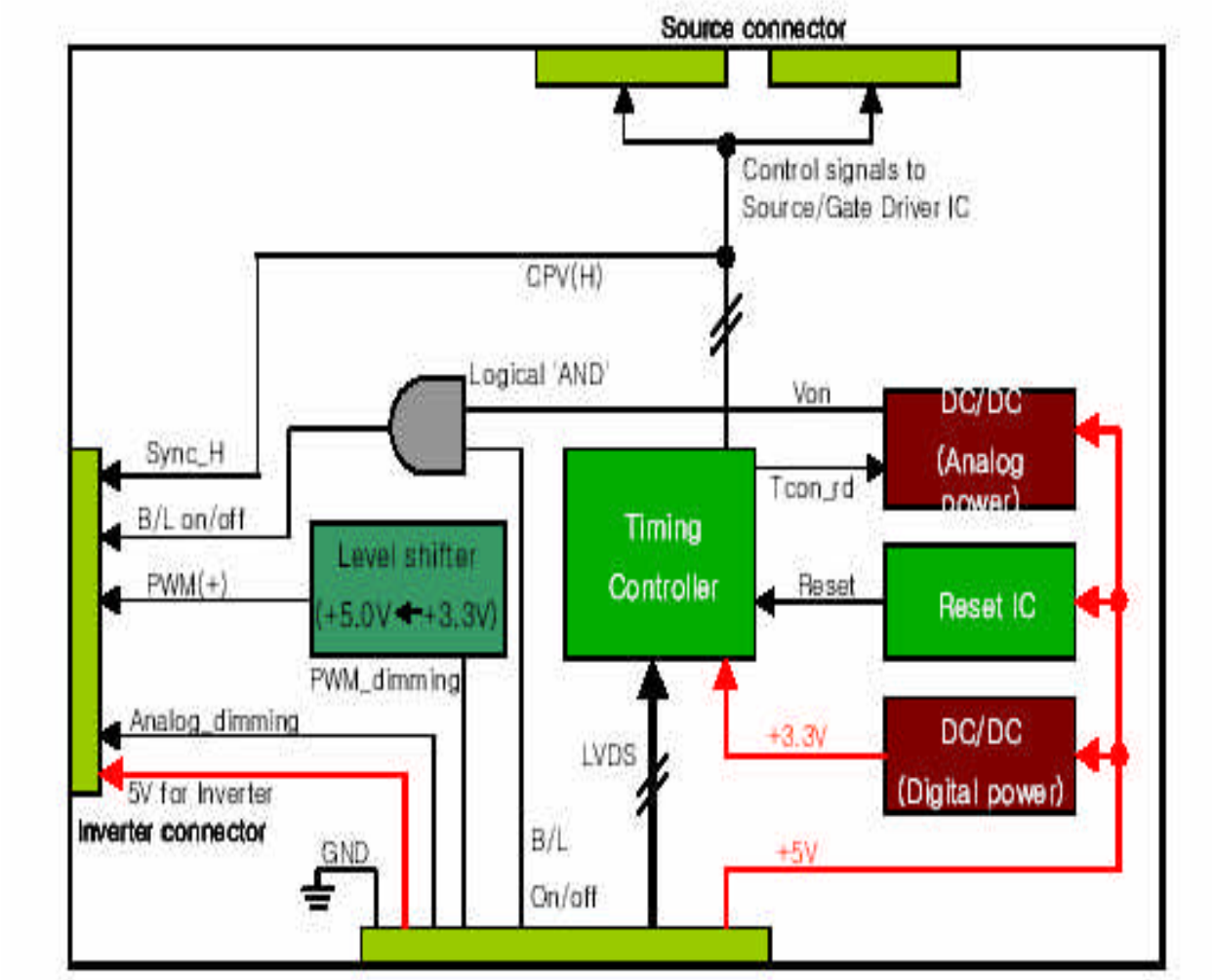
MODULE BASIC CONFIGURATION

[LTA260W1 - ### (SEC)]



MODEL NAME	DOCUMENT NO	REVISION NO	REVISION DATE	PAGE
ELT-2600AP	RD(1)	00	04/04/02	13/57

A/D BOARD PIN CONFIGURATION

Pin No		I/O	Specification	Description
CON4	1 (+12V)	I	+12V	MAIN B/D 12V Input
	2 (+12V)	I	+12V	MAIN B/D 12V Input
	3 (AC_DET)	I	+5V	AC_DETECT PIN
	4 (GND)		GND	Ground
	5 (GND)		GND	Ground
	6 (GND)		GND	Ground
	7 (S5V)	I	S5V	MAIN 5V Input
	8 (GND)		GND	Ground
	9 (BRITE_ADJ)	O	BRIGHTNESS_ADJUST	LCD Brightness Adjustment
	10 (GND)		GND	Ground
	11 (BKL_ON)	O	BACKLIGHT_ON	LCD Backlight ON
	12(POWER_ ON/OFF)	O	POWER_ON/OFF	POWER ON_OFF Control
CON2	1 (GND)		GND	Ground
	2 (LEDG)	O	LED_GREEN	GREEN LED CONTORL OUTPUT PORT : High : Green LED On
	3 (LEDR)	O	LED_RED	RED LED CONTORL OUTPUT PORT : High : Red LED On
	4 (IR)	I	5V / 0V	IR RECEIVER SIGNAL INPUT PORT
	5 (GND)		GND	Ground
	6 (VCC)	O	5V / 0V	OSD B/D 5V Output
CON1	1 (POWER)	I	5V / 0V	POWER S/W PORT :DC POWER ON_OFF
	2 (SOURCE)		SOURCE SELECT	Input Source Selecting
	3 (MENU)	I	MENU	OSD MENU Display
	4 (CH+)	I	CHANNEL UP	TV CHANNEL CONTROL(UP)
	5 (CH-)	I	CHANNEL DOWN	TV CHANNEL CONTROL(DOWN)
	6 (VOL+)	I	VOLUME UP	SOUND CONTROL(VOLUME UP)
	7 (VOL-)	I	VOLUME DOWN	SOUND CONTROL(VOLUME DOWN)
	8 (GND)		GND	Ground

	1 (VCC12)		VCC12	Power Supply +12.0V
	2 (VCC12)		VCC12	Power Supply +12.0V
	3 (VCC5A)		VCC5A	Power Supply +5.0V
	4 (MSP_L_OUT1)	O	MSP_L_OUT1	MSP LEFT Sound Output1
	5 (MSP_R_OUT1)	O	MSP_R_OUT1	MSP RIGHT Sound Output1
	6 (GND)		GND	Ground
	7 (MSP_L_OUT2)	O	MSP_L_OUT2	MSP LEFT Sound Output2
	8 (MSP_R_OUT2)	O	MSP_R_OUT2	MSP RIGHT Sound Output2
	9 (GND)		GND	Ground
	10 (AFT)	I	AFT	
J5	11 (TUNER_SIF)	I	TUNER_SIF	RF TV Sound Input
	12((GND)		GND	Ground
	13 (TUNER_CVBS)	I	TUNER_CVBS	RF TV Video Input
	14 (GND)		GND	Ground
	15 (S_MUTE)	O	S_MUTE	Sound Mute
	16 (AMP_ST-BY)	O	AMP_ST-BY	
	17 (HEAD_MUTE)	I	HEAD_MUTE	Head Phone Mute
	18 (GND)		GND	Ground
	19 (SDA3)		SDA3	I2C Protocol
	20 (SCL3)		SCL3	I2C Protocol
J1	1 (VCC5)		VCC5	Power Supply +5.0V
	2 (VCC5)		VCC5	Power Supply +5.0V
	3 (SCART_R)	I	SCART_R	Full Scart Red Input
	4 (SCART_G)	I	SCART_G	Full Scart GREEN Input
	5 (SCART_B)	I	SCART_B	Full Scart BLUE Input
	6 (SCART_FB)	I	SCART_FB	
	7 (GND)		GND	Ground
	8 (FSCART_CVBS_IN)	I	FSCART_CVBS_IN	Full Scart Composite Input
	9 (GND)		GND	Ground
	10 (HSCART_CVBS_IN)	I	HSCART_CVBS_IN	Half Scart Composite Input
	11 (GND)		GND	Ground
	12 (FSCART_ID)	I	FSCART_ID	Full Scart Check Signal Input
	13 (HSCART_ID)	I	HSCART_ID	Half Scart Check Signal Input
	14 (GND)	I	GND	Ground
	15 (F_CVBS_OUT)	O	F_CVBS_OUT	Full Scart Composite Output
	16 (GND)		GND	Ground
	17 (H_CVBS_OUT)	O	H_CVBS_OUT	Half Scart Composite Output
	18 (GND)		GND	Ground
	19 (F_CVBS_L_OUT)	O	F_CVBS_L_OUT	Full Scart Composite Left Sound Output

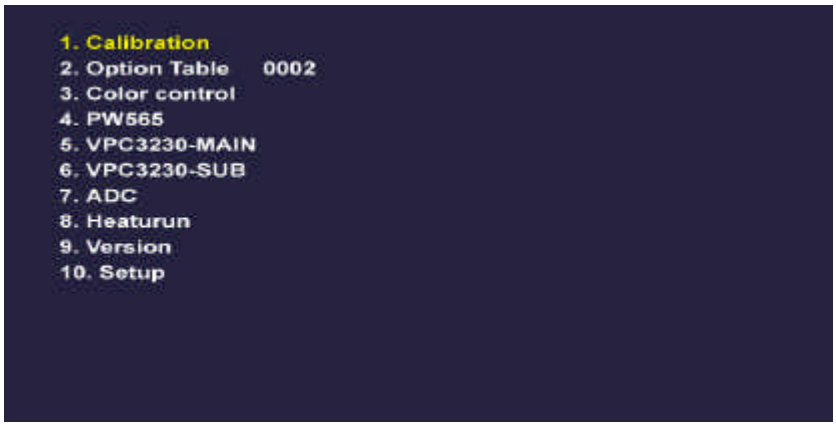
	20 (F_CVBS_R_OUT)	O	F_CVBS_R_OUT	Full Scart Composite Right Sound Output
	21 (GND)		GND	Ground
	22 (H_CVBS_L_OUT)	O	H_CVBS_L_OUT	Half Scart Composite Left Sound Output
	23 (H_CVBS_R_OUT)	O	H_CVBS_R_OUT	Half Scart Composite Right Sound Output
	24 (GND)		GND	Ground
J2	1 (VCC5)		VCC5	Power Supply +5.0V
	2 (F_SC_L_IN)	I	F_SC_L_IN	Full Scart Left Sound Input
	3 (F_SC_R_IN)	I	F_SC_R_IN	Full Scart Right Sound Input
	4 (GND)		GND	Ground
	5 (H_SC_L_IN)	I	H_SC_L_IN	Half Scart Left Sound Input
	6 (H_SC_R_IN)	I	H_SC_R_IN	Half Scart Right Sound Input
	7 (GND)		GND	Ground
	8 (AV_CVBS_IN)	I	AV_CVBS_IN	Composite Video Input
	9 (AV_CVBS_DET)	I	AV_CVBS_DET	Composite Check Signal Input
	10 (GND)		GND	Ground
	11 (SVIDEO_L_IN)	I	SVIDEO_L_IN	SVIDEO_Left Sound Input
	12 (SVIDEO_R_IN)	I	SVIDEO_R_IN	SVIDEO_Right Sound Input
	13 (GND)		GND	Ground
	14 (PC_L_IN)	I	PC_L_IN	Analog RGB Left Sound Input
	15 (PC_R_IN)	I	PC_R_IN	Analog RGB Right Sound Input
	16 (GND)	I	GND	Ground
	17 (DTV_L_IN)	I	DTV_L_IN	Component(DTV) Left Sound Input
	18 (DTV_R_IN)	I	DTV_R_IN	Component(DTV) Right Sound Input
	19 (GND)		GND	Ground
	20 (DVD_L_IN)	I	DVD_L_IN	Component(DVD) Left Sound Input
	21 (DVD_R_IN)	I	DVD_R_IN	Component(DVD) Right Sound Input
	22 (GND)		GND	Ground
	23 (AV_L_IN)	I	AV_L_IN	Composite Left Sound Input
	24 (AV_R_IN)	I	AV_R_IN	Composite Right Sound Input

CON5	1 (NC)		NC	NC
	2 (ANLOG_DIM)		BRIGHTNESS_ADJUST	LCD Brightness Adjustment
	3 (BLK_ON)		BACKLIGHT_ON	LCD Backlight ON
	4 (GND)		GND	Ground
	5 (ODD0-)	O	RX0-	Negative LVDS Differential data input. Channel 0
	6 (ODD0+)	O	RX0+	Positive LVDS Differential data input. Channel 0
	7 (GND)		GND	Ground
	8 (ODD1-)	O	RX1-	Negative LVDS Differential data input. Channel 1
	9 (ODD1+)	O	RX1+	Positive LVDS Differential data input. Channel 1
	10 (GND)		GND	Ground
	11 (ODD2-)	O	RX2-	Negative LVDS Differential data input. Channel 2
	12 (ODD2+)	O	RX2+	Positive LVDS Differential data input. Channel 2
	13 (GND)		GND	Ground
	14 (ODDCLK-)	O	RXCLK-	Negative LVDS Differential Clock input.
	15 (ODDCLK+)	O	RXCLK+	Positive LVDS Differential Clock input.
	16 (GND)		GND	Ground
	17 (ODD3-)	O	RX3-	Negative LVDS Differential data input. Channel 3
	18 (ODD3+)	O	RX3+	Positive LVDS Differential data input. Channel 3
	19 (GND)		GND	Ground
	20 (NC)		NC	NC
	21 (NC)		NC	NC
	22 (NC)		NC	NC
	23 (GND)		GND	Ground
	24 (GND)		GND	Ground
	25 (GND)		GND	Ground
	26 (VCC 5)		VCC	+5.0V Power Supply
	27 (VCC 5)		VCC	+5.0V Power Supply
	28 (VCC 5)		VCC	+5.0V Power Supply
	29 (VCC 5)		VCC	+5.0V Power Supply
	30 (VCC 5)		VCC	+5.0V Power Supply

P3	1 (GND)		GND	Ground
	2 (GND)		GND	Ground
	3 (VCC12)	O	12VCC	Power Supply +12.0V
	4 (VCC12)	O	12VCC	Power Supply +12.0V
	5 (VCC12)	O	12VCC	Power Supply +12.0V
	6 (VCC12)	O	12VCC	Power Supply +12.0V
	7 (GND)		GND	Ground
	8 (GND)		GND	Ground
	9 (ODD3+)	O	RD+	LVDS Receiver Signal(+) Positive
	10 (ODD3-)	O	RD-	LVDS Receiver Signal(-) Negative
	11 (ODDCLK+)	O	RCLK+	LVDS Receiver Clock Signal(+) Positive
	12 (ODDCLK-)	O	RCLK-	LVDS Receiver Clock Signal(-) Negative
	13 (ODD2+)	O	RC+	LVDS Receiver Signal(+) Positive
	14 (ODD2-)	O	RC-	LVDS Receiver Signal(-) Negative
	15 (ODD1+)	O	RB+	LVDS Receiver Signal(+) Positive
	16 (ODD1-)	O	RB-	LVDS Receiver Signal(-) Negative
	17 (ODD0+)	O	RA+	LVDS Receiver Signal(+) Positive
	18 (ODD0-)	O	RA-	LVDS Receiver Signal(-) Negative
	19 (GND)		GND	Ground
	20 (GND)		GND	Ground

OSD MENU(FACTORY)

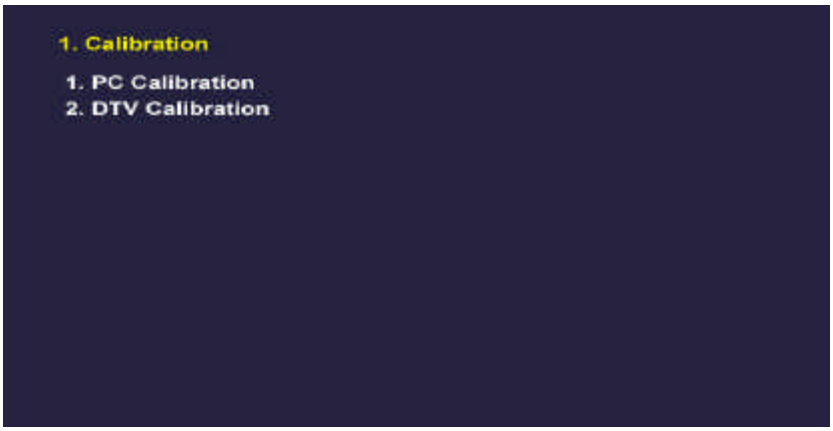
CALIBRATION MENU



FACTORY MODE

- 1. Calibration
  : Automatic adjustment of white balance for Analogue input (PC) and Component2 (DTV) input.
- 2. Option Table 0002
  : Initial installation of OSD.
- 3. Color control
  : Adjustment of contrast and brightness for scaler generating power.
- 4. PW565
  : Adjustment of contrast and brightness for scaler input port (CH1 or CH2).
- 5. VPC3230-MAIN
  : Value adjustment for video decoder's brightness and contrast, color tickness in the main window.
- 6. VPC3230-SUB
  : Value adjustment for video decoder's brightness and contrast, color tickness in the sub window.
- 7. ADC
  : Value adjustment for brightness and contrat, color thickness of analogue RGB, Y,Pb,Pr of AD9883 A/D convertor.
- 8. Heatrun
  : The mode when you do aging.
- 9. Version
  : It shows the information of Firmware version and Panel.
- 10. Setup
  : Installation of TTX language and video, protocol, logo.

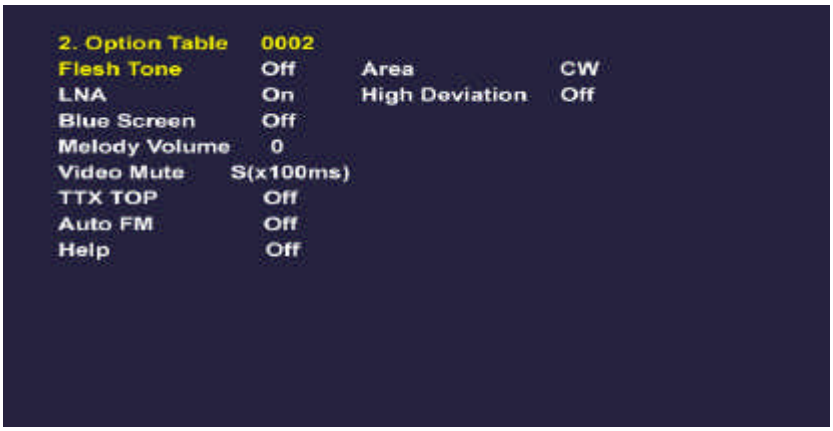
CALIBRATION MENU



CALIBRATION MENU

- 1. PC Calibration
  : Automatic adjustment as the fittest status of white balance for analogue input (PC)
- 2. DTV Calibration
  : Automatic adjustment as the fittest status of white balance for component2 (DTV) input.

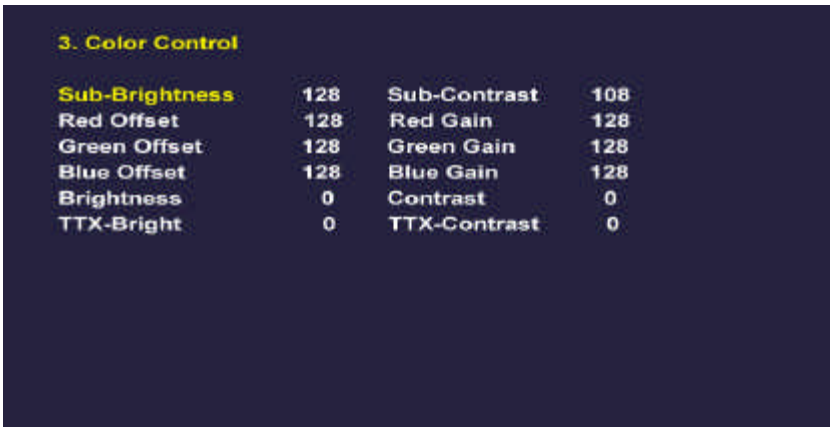
OPTION TABLE MENU



OPTION TABLE MENU

- Flesh tone
- LNA(Low Noise Amplifier)
  : On/Off Installation of screen quality improvement fuction, when TV input signal is weak.
- Blue Screen
  : When there are no input signal of the TV and external equipment, you can install the screen color as blue.
- Melody Volume
  : Installation of the melody volume for initial soft power On/Off. The volume is ex-factoried as “0 ” due to license.
- Video Mute
- TTX TOP
- Auto FM
- Help
- Area
- High Deviation

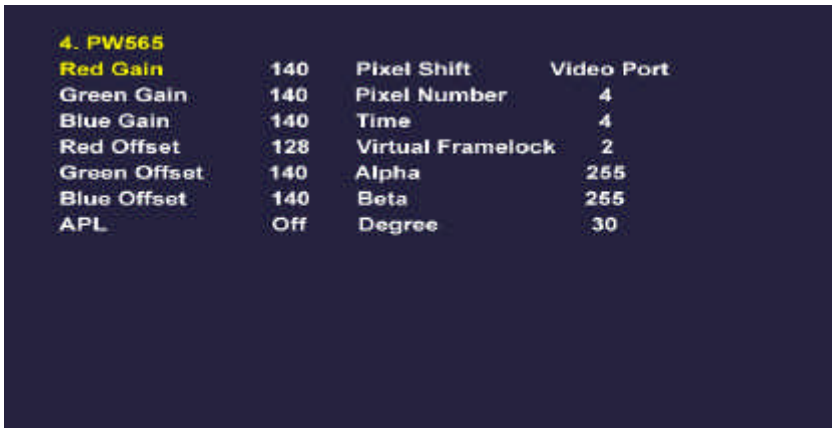
COLOR CONTROL MENU



COLOR CONTROL MENU

- Sub-Brightness
  : The brightness adjustment of scaler generating power.
- Red, Green, Blue Offset
  : The brightness adjustment of each Red, Green, Blue for scaler generating power.
- Brightness
  : The brightness adjustment of current screen. Adjustment value of brightness for User Menu
- TTX-Bright
  : It is not useful mode.
- Sub Contrast
  : Contrast adjustment of scaler generating power.
- Red, Green, Blue Gain
  : Contrast adjustment of each Red, Green, Blue for Scaler generating power.
- Contrast
  : Contrast adjustment for current screen. The value adjustment of contrast for User Menu
- TTX-Contrast
  : It is not useful mode.

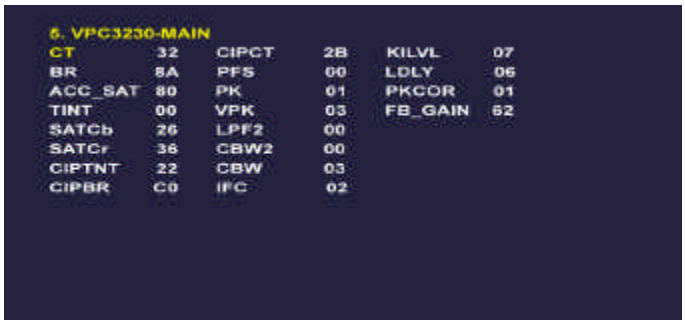
PW565 MENU



PW565 MENU

- Red,Green,Blue Gain
  : The contrast value adjustment of each Red, Green, Blue for scaler input port (CH1 OR CH2)
- Red,Green,Blue Offset
  : The brightness adjustment of each Red, Green, Blue for scaler input port (CH1 OR CH2)
- APL
- Pixel Shift
- Pixel Number
- Time
- Virtual Framelock
  : Installation of flame frequency for panel (50Hz, 60Hz).
- Alpha
- Beta
- Degree

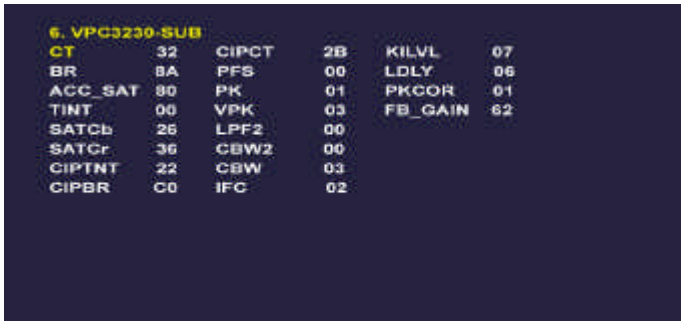
VPC3230-MAIN MENU



VPC3230-MAIN MENU

- CT
  : Contrast adjustment of Composite & S-Video form ' s signal.
- BR
  : Brightness adjustment of Composite & S-Video form ' s signal.
- ACC_SAT
- TINT
  : The color sense adjustment of Composite & S-Video form ' s signal.
- SATCb
  : The blue color sense adjustment of Component & RGB form ' s signal.
- SATCr
  : The red color sense adjustment of Component & RGB form ' s signal
- CIPTNT
  : The color sense adjustment of Component & RGB form ' s signal.
- CIPBR
  : The brightness adjustment of Component & RGB form ' s signal.
- KILVL
- LDLY
  : The delayed time adjustment of brightness signal.
- PKCOR
- FB_GAIN

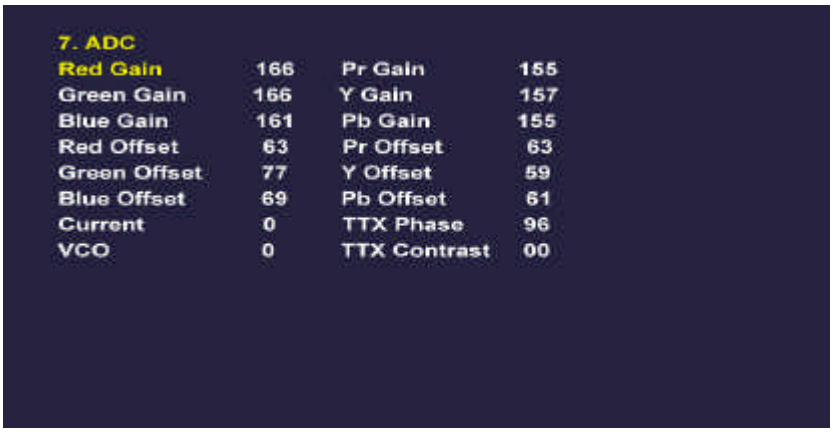
VPC3230-SUB MENU



VPC3230-SUB MENU

- CT
  : The contrast adjustment of Composite & S-Video form ' s signal.
- BR
  : The brightness adjustment of Composite & S-Video form ' s signal.
- ACC_SAT
- TINT
  : The color sense adjustment of Composite & S-Video form ' s signal.
- SATCb
  : The blue color sense adjustment of Component & RGB form ' s signal.
- SATCr
  : The red color sense adjustment of Component & RGB form ' s signal.
- CIPTNT
  : The color sense adjustment of Component & RGB form ' s signal.
- CIPBR
  : The brightness adjustment of Component & RGB form ' s signal.
- KILVL
- LDLY
  : The delayed time installation of brightness signal.
- PKCOR
- FB_GAIN

ADC MENU



ADC MENU

- Red, Green, Blue Gain
  : Control ADC input range (Contrast) of each respective channel.

- Red, Green, Blue Offset
  : Control dc offset (Brightness) of each respective channel.
- Current
  : Installation of PLL Part VCO Current. (For test)
- VCO
  : Installation of PLL Part VCO Range (For test)
- Pr, Y, Pb Gain
  : Contrast adjustment of Component2 Pr, Y, Pb signal.
- Pr, Y, Pb Offset
  : Brightness adjustment of Component2 Pr, Y, Pb signal.
- TTX Phase
  : It is not useful mode.
- TTX Contrast
  : It is not useful mode.

HEATRUN MENU

HEATRUN MENU

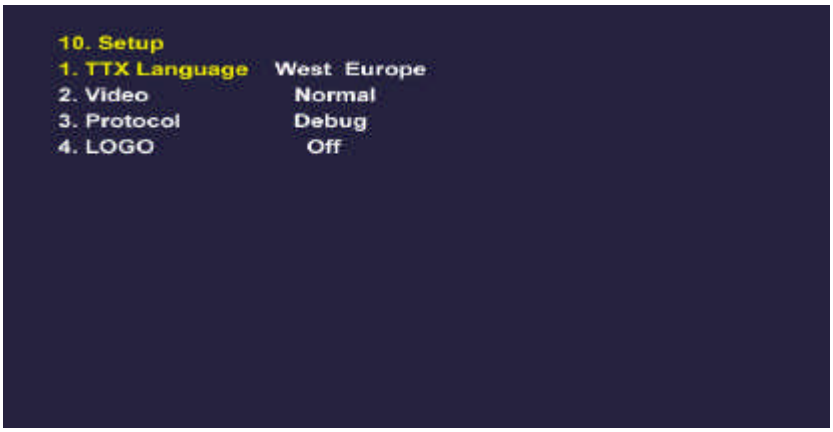
- 1. Auto Run
  : It is the mode to change the heatrun pattern as a certain time interval.
- 2. Luma Ramp (16 Step)
  : It is gray pattern of 16 Step.
- 3. Luma Ramp (128 Step)
  : It is gray pattern of 128 Step.
- 4. White 16
  : It is low Gray pattern.
- 5. White 240
  : It is high gray pattern.
- 6. Color Bar
  : It is color Bar Pattern.
- 7. RGB Ramp (32 Step)
  : It is RGB Ramp pattern of 32 Step.

VERSION MENU

VERSION MENU

- Version
  : It is to show the Firmware Version.
- Release
  : It is to show the date of Firmware revision.
- Panel Used Time
  : It is to show the used time of Panel.
- Panel Name
  : It is to show the name of the PDP.

SETUP MENU



SETUP MENU

- 1. TTX Language
  : Installation of initial language of the TTX.
- 2. Video
  : Video format per country and it is composed of Normal, NTSC, PAL N, M
- 3. Protocol
  : Installation of communication protocol for remote control.
- 4. LOGO
  : Installation to show company logo on the screen when power "On" (ON/OFF).

DESCRIPTION OF A/D FUNCTIONS

■ PSM (Picture Status Memory)

Function to adjust picture status to an optimal condition in accordance with the type of program being viewed (custom, dynamic, standard, movie, mild).

■ SSM (Sound Status Memory)

Function to adjust sound status to an optimal condition in accordance with the type of program being viewed (custom, standard, music, movie, speech).

■ ARC (Aspect Ratio Control)

Function to adjust the picture size. (Auto wide, wide, panorama, zoom1, zoom2, 4:3, 14:9)

■ PANORAMA

Function to prevent pictures recorded in the 4:3 format from being stretched to the extreme left and right when played on a 16:9 display. Since the focus of the camera is concentrated on the center, it naturally enlarges the picture within the outer perimeter of the screen without expanding the central area.

■ PIP (Picture In Picture)

Function to enable the simultaneous viewing of two pictures by displaying a small sub-frame within the main picture. The main picture may be viewed with multiple types of input source (Analog/Digital RGB, composite, S-Video, component), while the sub-frame is only available in composite, S-Video or component (480i).

■ PBP (Picture By Picture)

Function to assign two separate signals onto a single screen, thereby enabling the viewer to simultaneously watch different pictures on each half of the display.

■ PIP Swap Simultaneous Conversion Between Sub and Main Pictures.

Function to convert between the sub-frame and main picture being watched simultaneously.

■ PIP Sound Swap Simultaneous Conversion Between sub and Main Picture Audio

Function to convert between simultaneous audio streams from the sub-frame and main picture being viewed.

■ EQUALIZER

Function to control sound according to frequency. (100Hz, 300Hz, 1KHz, 3KHz, 10KHz)

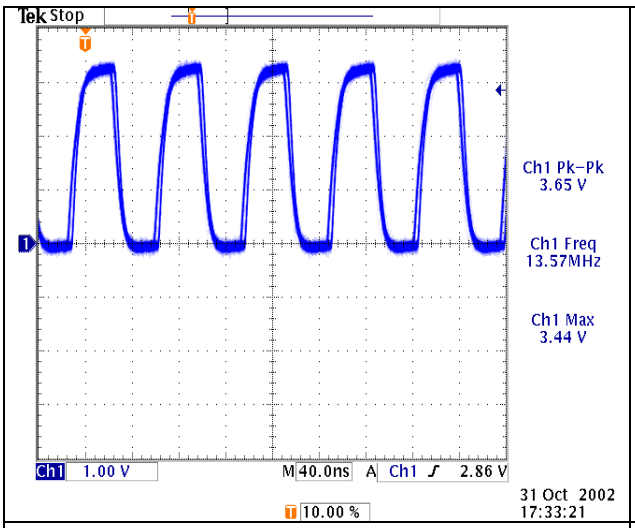
■ AVL (Auto Volume Level)

Function to automatically adjust varying sound levels from each individual broadcasting company to an appropriate volume, in case of watching a television connected to external equipment. This allows to viewer to enjoy a comfortable and stable sound level even when changing the channel.

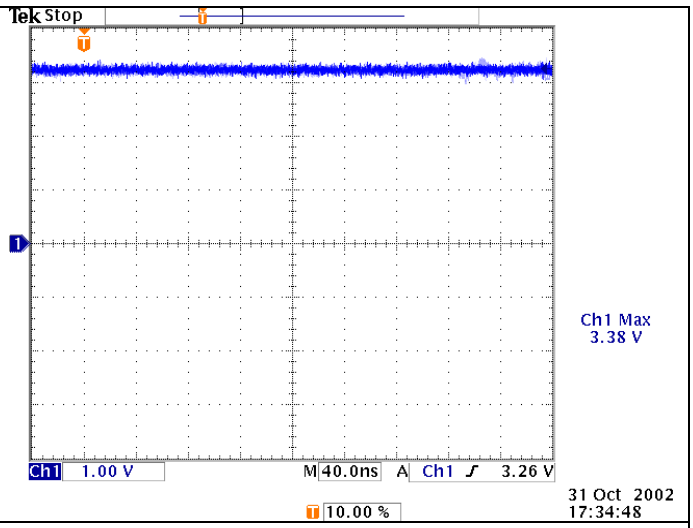
CIRCUIT OPERATION & WAVEFORM

■ VPC3230D (Video Processor)

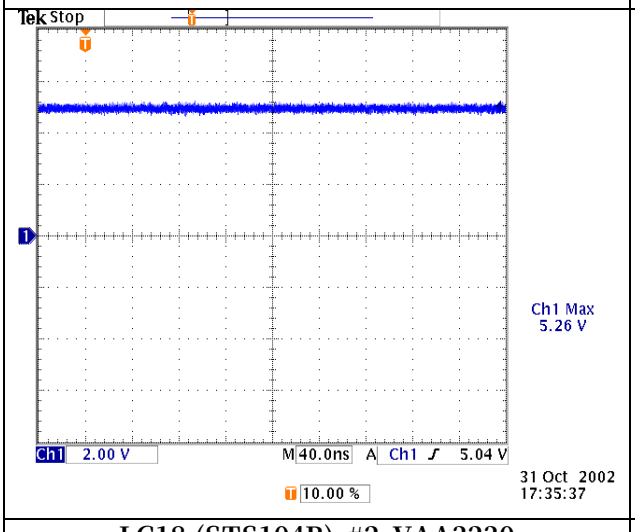
Converts analog pictures (including Composite, S-Video, Component (480i) or the like) to Y-UV digital pictures. Compatible with various TV formats of NTSC, PAL, SECAM, etc.



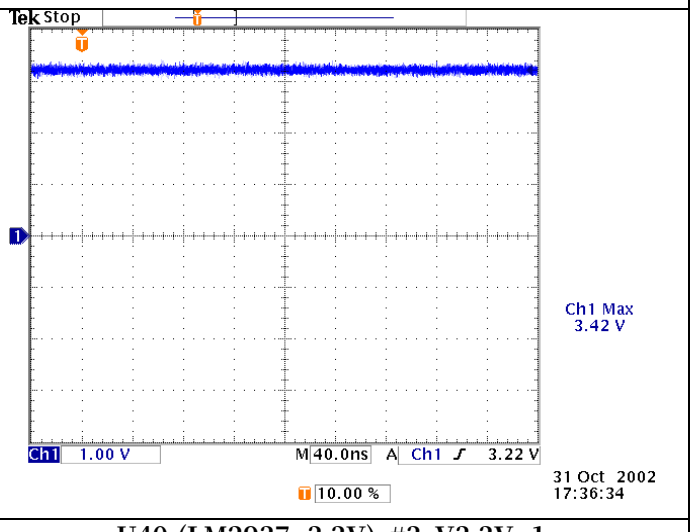
U41 (VPC3230D)_#28_S-LLC1



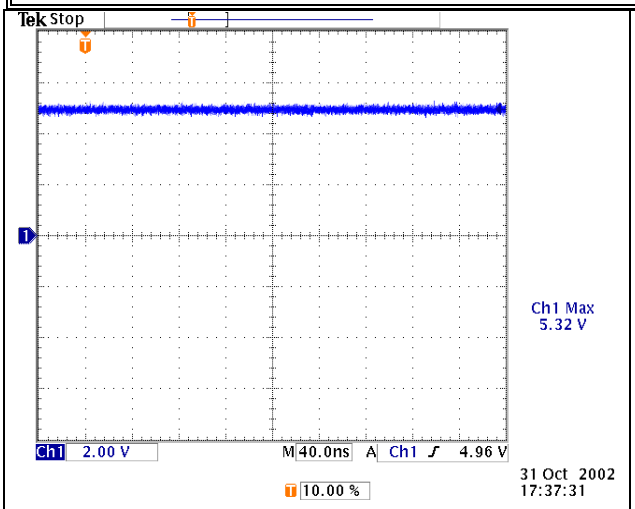
U42 (LM2937-3.3V)_#3_V3.3



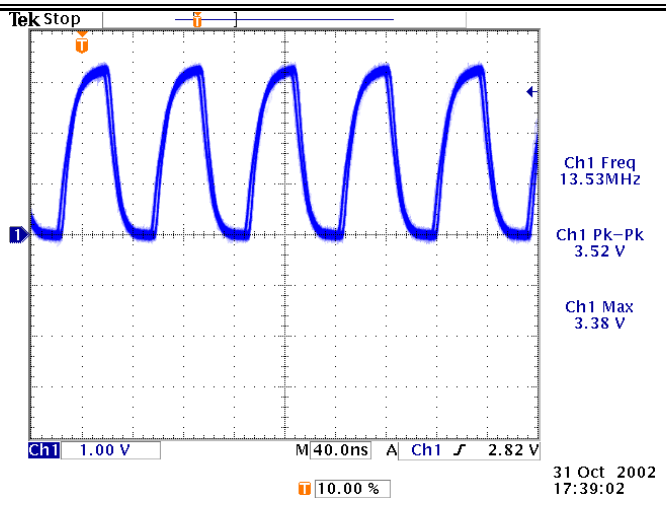
LC18 (STS104B)_#2_VAA3230



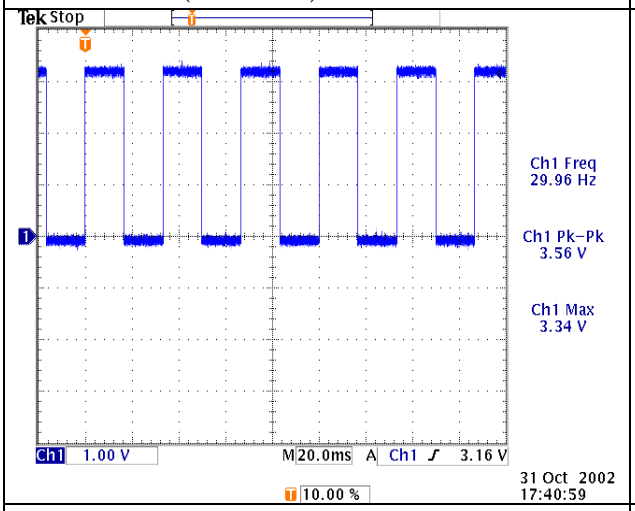
U40 (LM2937-3.3V)_#3_V3.3V-1



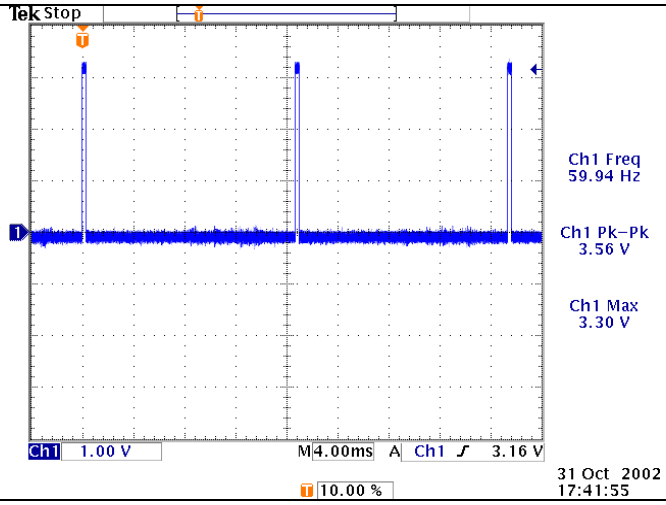
LC16 (STS104B)_#2_VAA3230_1



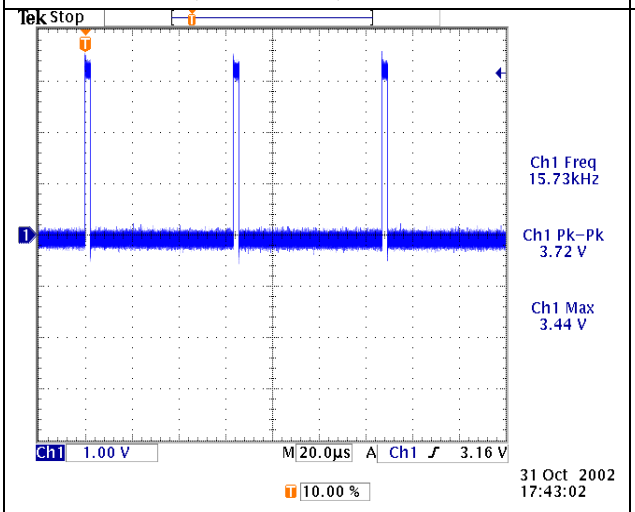
U41 (VPC3230D)_#28_VID_CLK



U41 (VPC3230D)_#53_INTLC



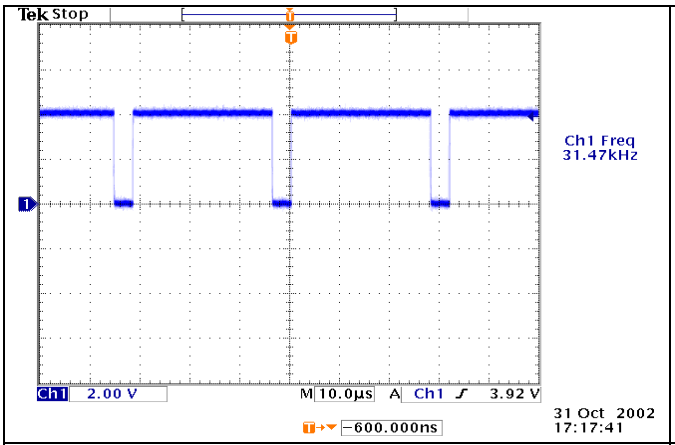
U41 (VPC3230D)_#57_VID-VS



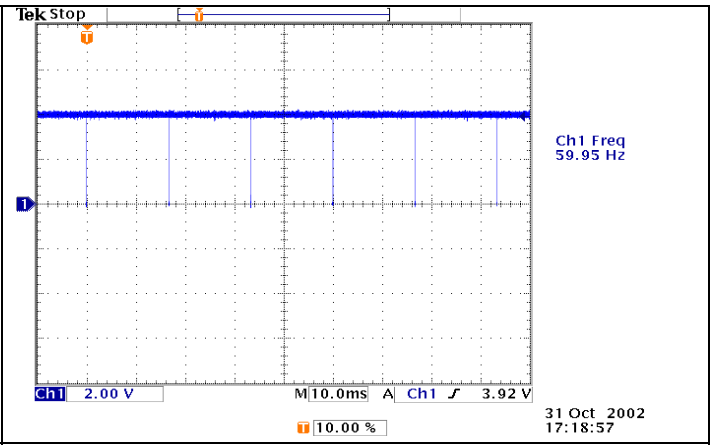
U41 (VPC3230D)_#56_VID-HS

■ AD9883 (A/D Converter)

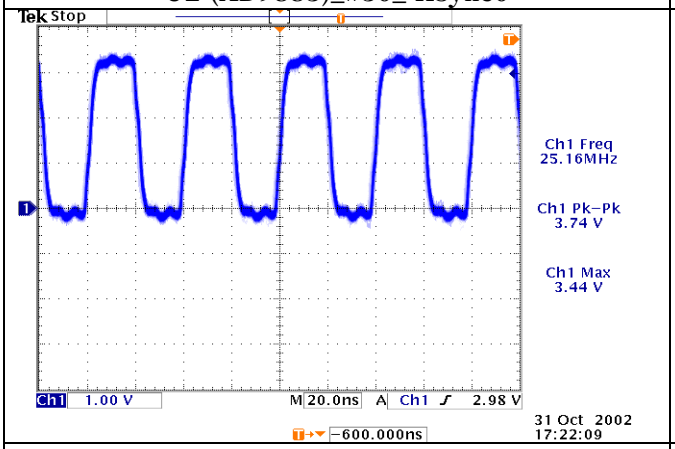
Converts an analog RGB signal to a process able digital signal. Converts a component signal (480p, 720p, 1080i) to a digital signal and transmits it to PW565 (Scaler).



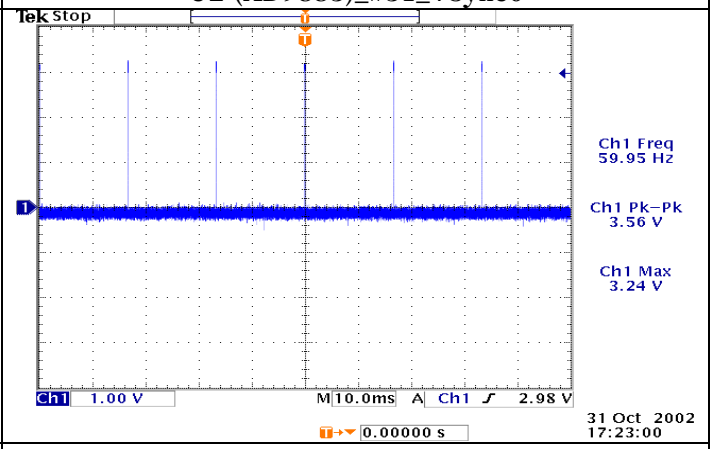
U2 (AD9883)_#30_ Hsync0



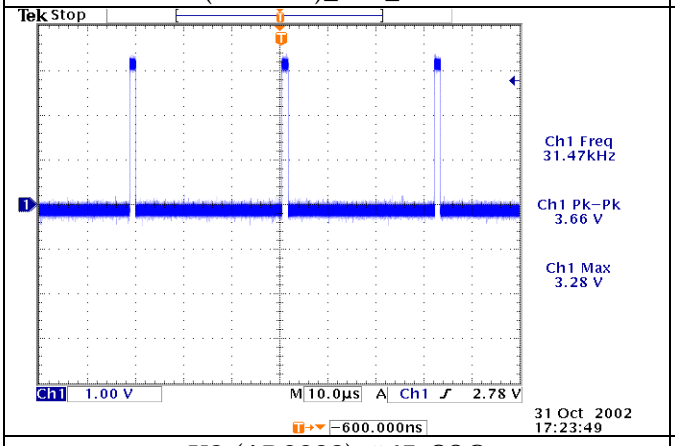
U2 (AD9883)_#31_Vsync0



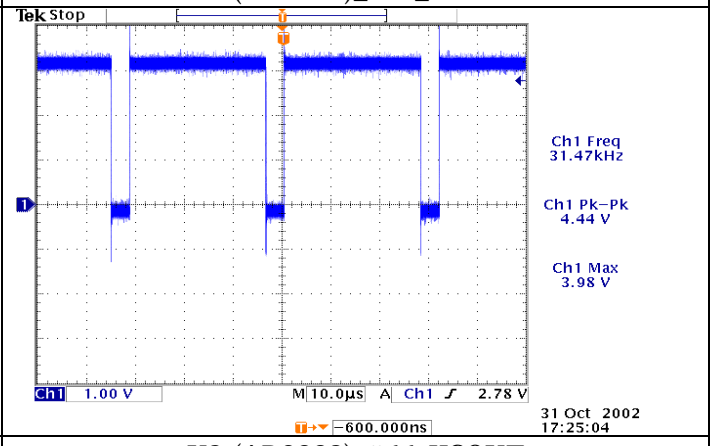
U2 (AD9883)_#67_DATACK



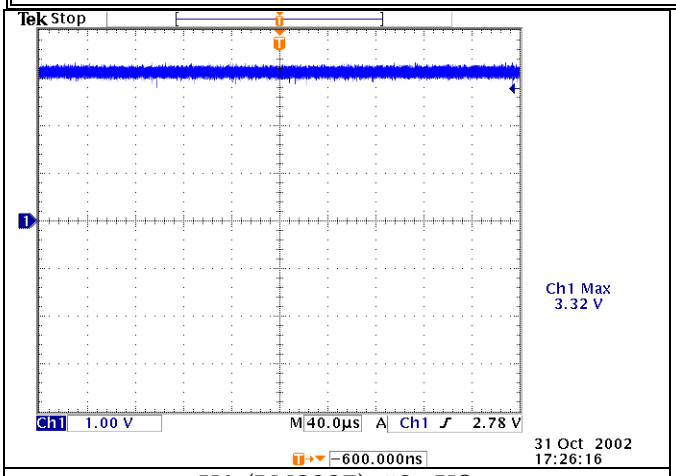
U2 (AD9883)_#64_VSOUT



U2 (AD9883)_#65_SOG



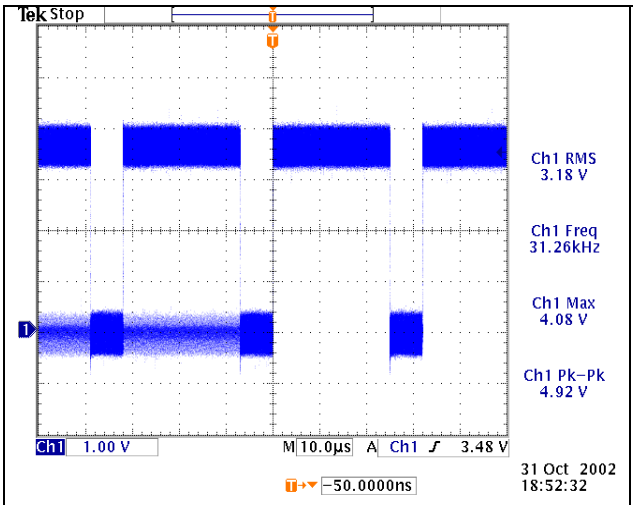
U2 (AD9883)_#66_HSOUT



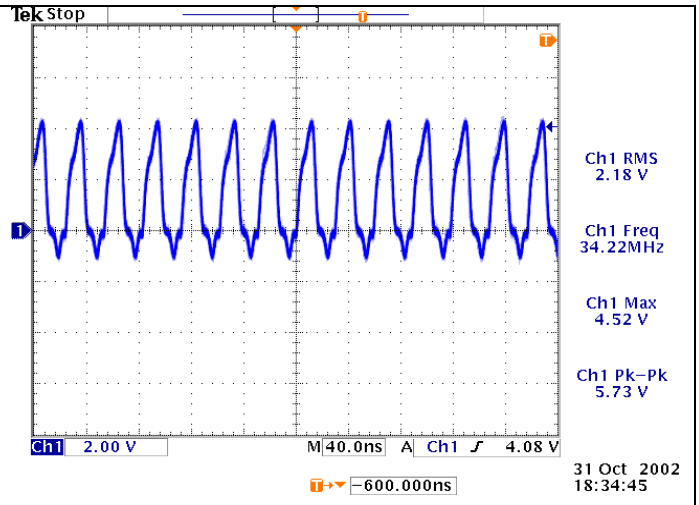
U1 (LM2937)_#3_ VO

■ PW565 (Scaler)

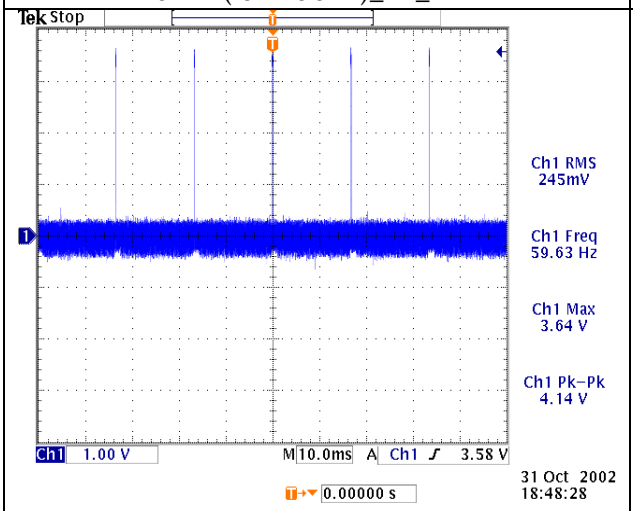
Receives, at the same time, a video signal from VPC3230, an Analog/Digital RGB signal and a Component signal, which are converted at AD9883 and THC63DV151, adjusted to a LCD display, and transmitted to a LCD module. In particular, it receives any PC signal input at various scanning rates and performs scaling to adjust to LCD resolution.



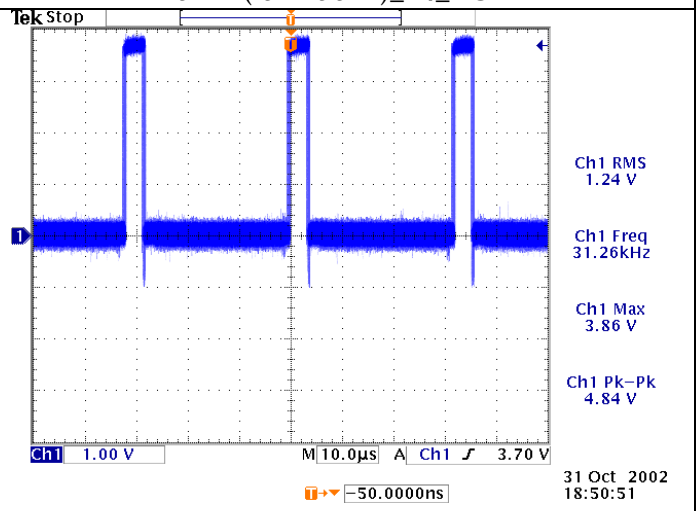
RP12 (R-ARRAY)_#1_DEN



RP12 (R-ARRAY)_#4_DCLK



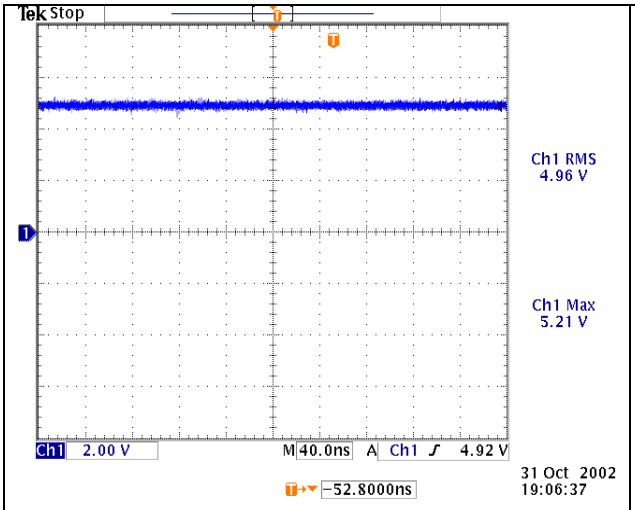
RP12 (R-ARRAY)_#3_DVS



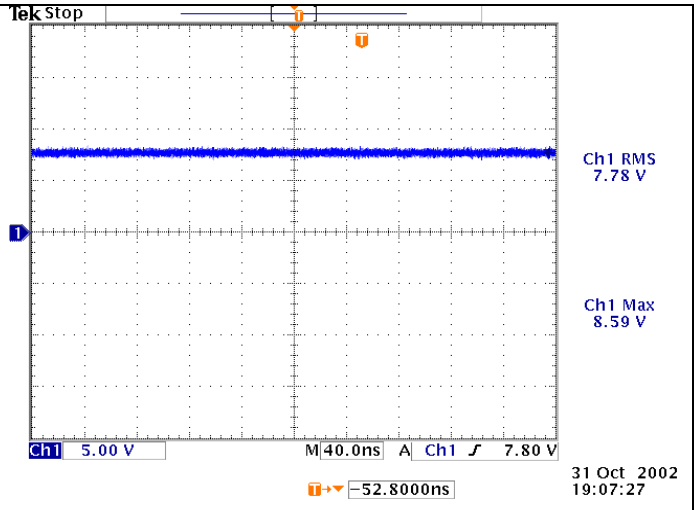
RP12 (R-ARRAY)_#2_DHS

■ MSP3450 (Sound Processor)

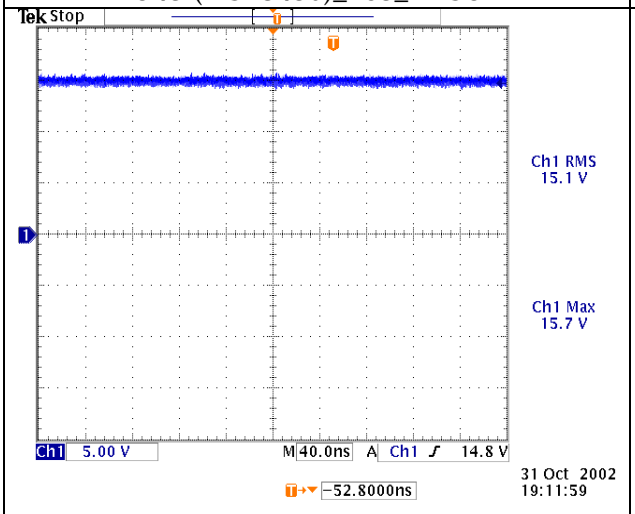
Receives and converts any Sound IF signal from a TV Tuner to a general audio signal (LCD TV). Also, outputs the desired input signal out of many audio input signal options, and produces a woofer signal or Headphone signal as well as a general Speaker signal (LCD TV).



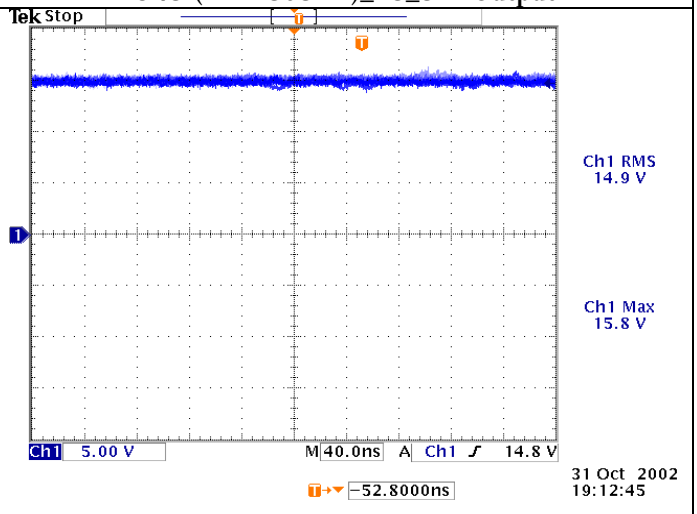
U45 (MSP3450)_#65_AVSUP



U43 (KIA7808AF)_#3_8V-Output

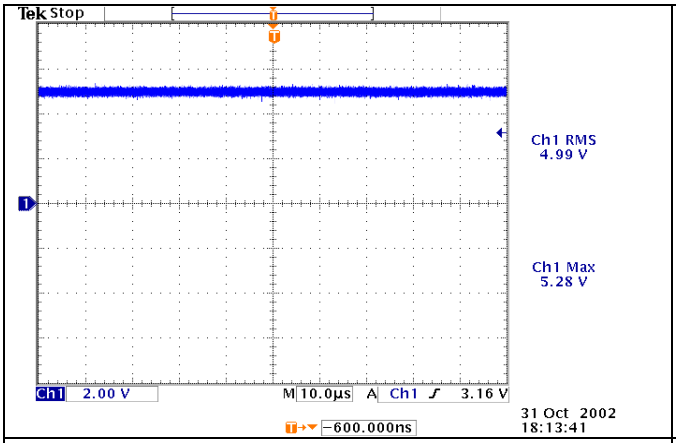


U45(MSP3450)_#36 ” _Audio R-Out

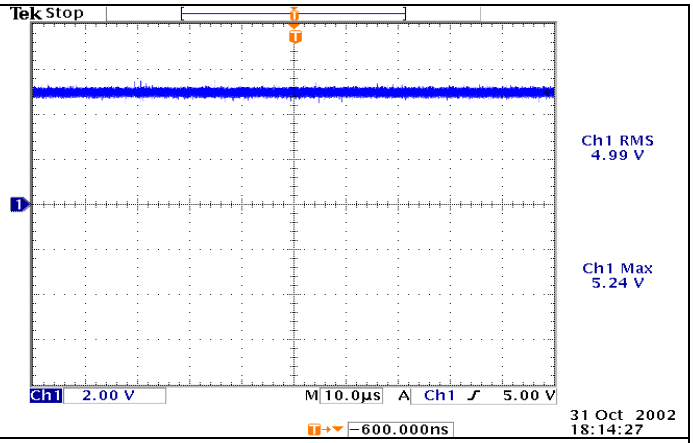


U45(MSP3450)_#36 ” _Audio L-Out

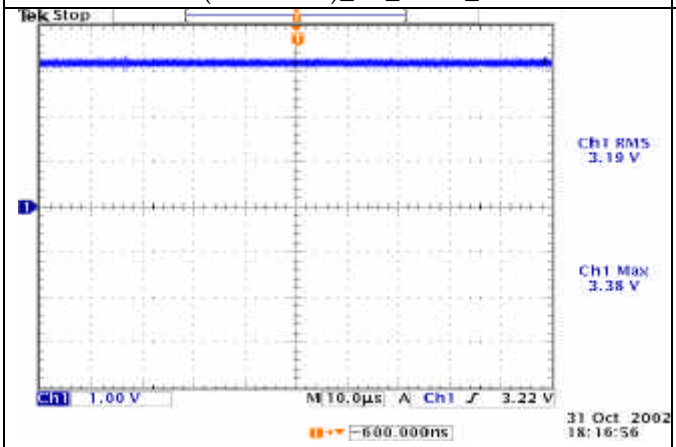
■ Power & MISC Waveform



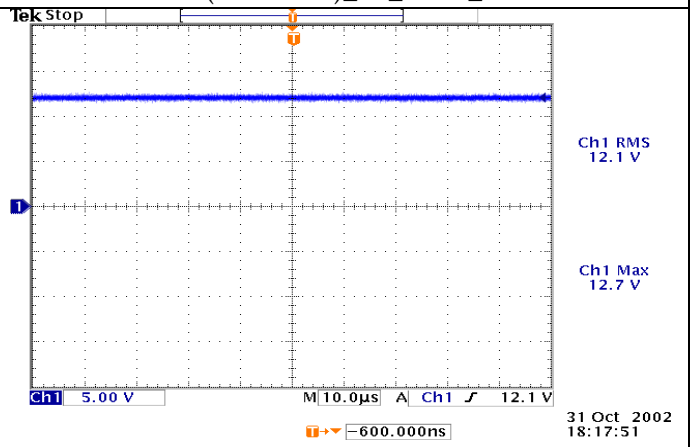
LC20 (STS104B)_#2_C344_5VST



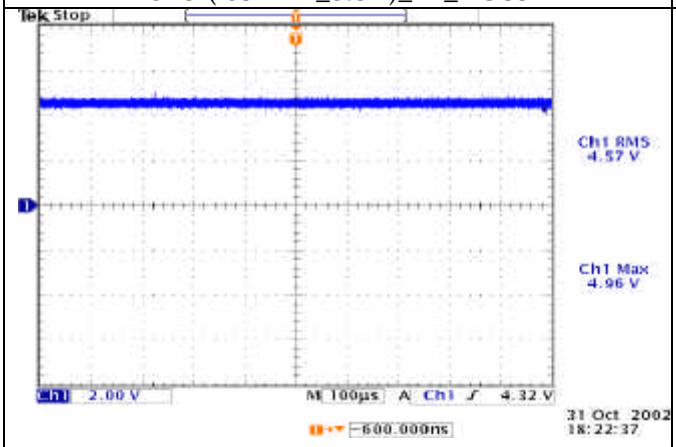
LC21 (STS104B)_#2_C353_5VDD



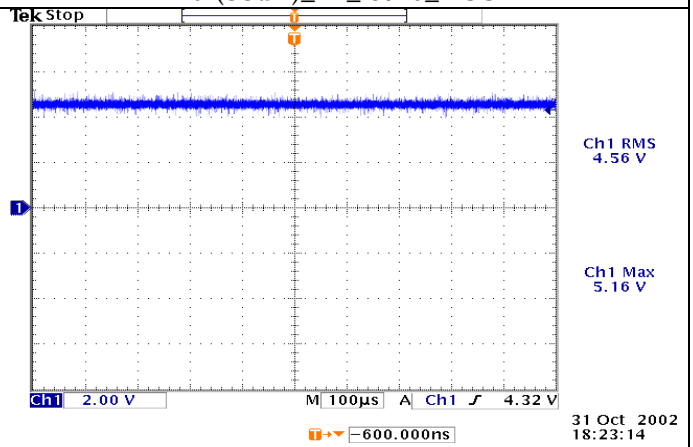
U15 (RC1117_3.3V)_#2_VCC3



L10 (33uH)_#2_R410_VCC12



Q33 (MMBT3904)_ " C " _RL_ON



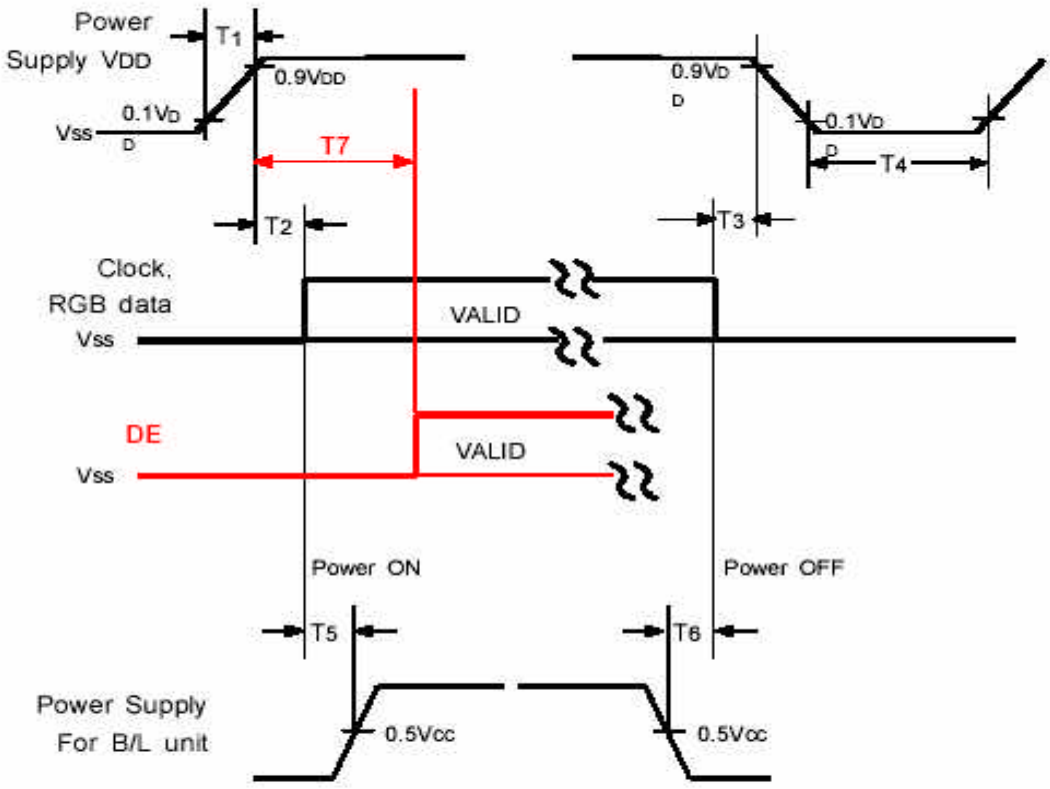
Q30 (MMBT3904)_ " C " _VAVS_ON

MODULE POWER SEQUENCE

[LTA260W1 - ### (SEC)]

1. Power ON/OFF Sequence

: To prevent a latch-up or DC operation of the LCD module, the power on/off sequence should be as the diagram below.



0<T1≤30msec
0<T2≤50msec
0<T3≤50msec
300msec≤T4
500msec ≤ T5(Recommend Value)
100msec ≤ T6(Recommend Value)
650msec ≤ T7

NOTE.

(1) The supply voltage of the external system for the module input should be the same as the definition of VDD.

(2) Apply the lamp voltage within the LCD operation range. When the back-light turns on before the LCD operation or the LCD turns off before the back-light turns off, the display may momentarily become abnormal screen.

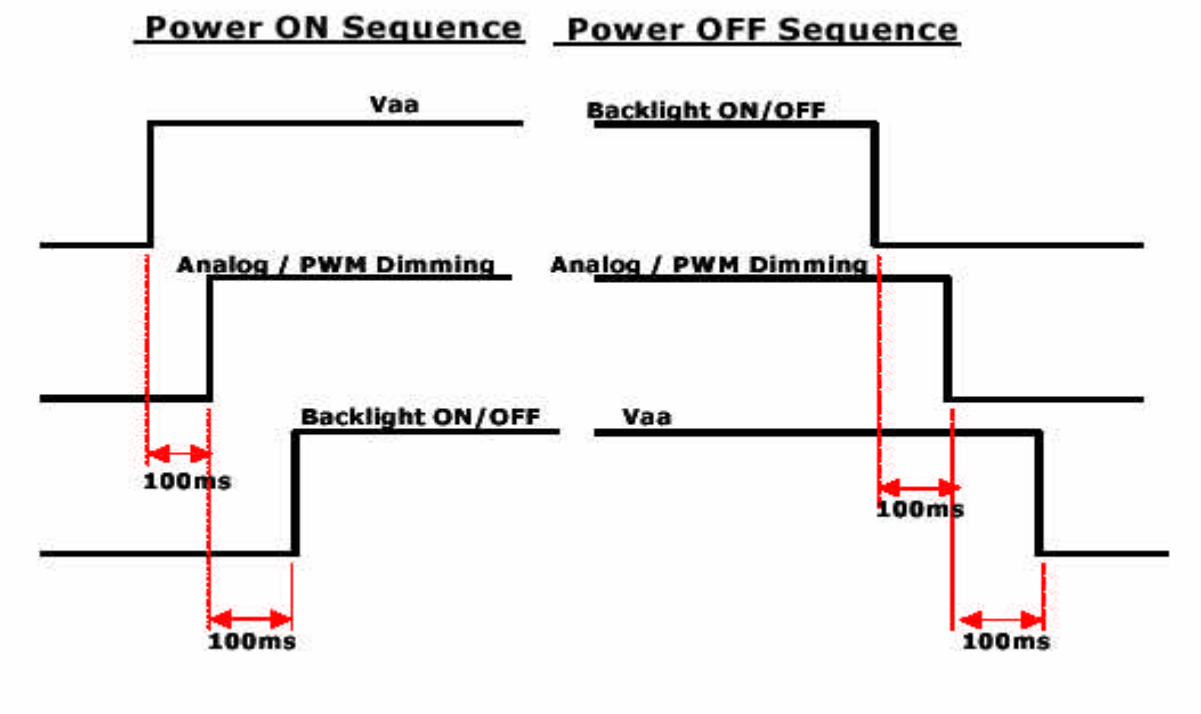
(3) In case of VDD = off level, please keep the level of input signals on the low or keep a high impedance.

(4) T4 should be measured after the module has been fully discharged between power off and on period.

(5) Interface signal shall not be kept at high impedance when the power is on.

(6) T2 : LVDS Clock Signal, T7 : DE & LVDS RGB signal A DE signal should be input after 650[msec].
The purpose is to prohibit an abnormal display from occurring when the data to initialize the T-con are read in from EEPROM.

2. Inverter Power Sequence

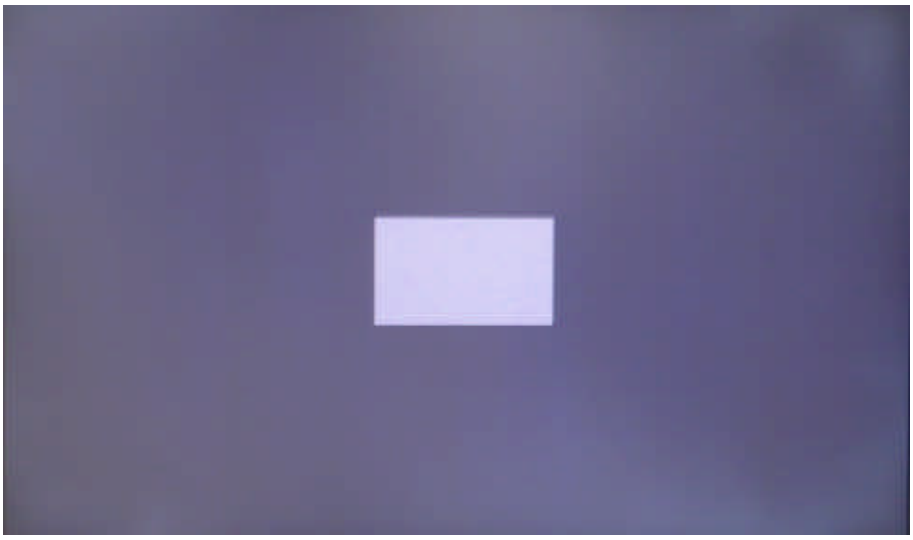


WHITE BALANCE ADJUSTMENT

Color temperature (White Balance) adjustment

1) How to enter Factory mode for adjustment of White Balance
   (1) LCD TV Power " On " --> Input select key on Remote control.
   (2) Choose composite first and then LCD TV Power " Off ".
   (3) LCD TV Power " Off " and SSM on the R/C ==> PSM ==> LAST ==> ENTER Key

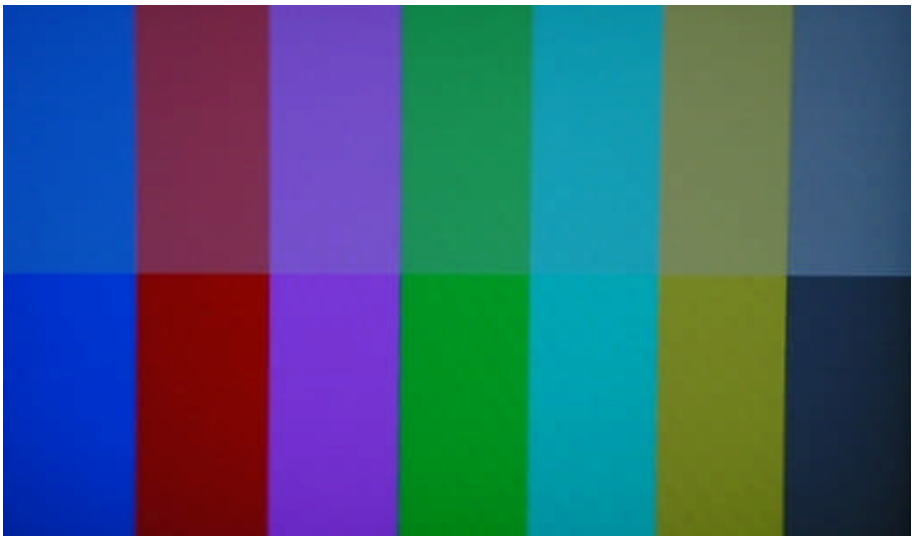
2) For COMPOSITE adjustment (manual adjustment)



   (1) Signal Generator supply the pattern of above picture. (Timing ⇒ 386, Pattem ⇒ 10)
   (2) After movement to 2.color control on Factory Mode2, move to sub menu as choice of volume button.
   (3) After check the Brightness ⇒ 50, Contrast ⇒ 85, choose the Sub-Brightness. Zero calibration ' s execution of CA-110 and the sensor Keep distance of about 10 Cm in surface of LCD module
   (4) Adjustment as choice of volume button in order that it becomes Y= 10.0 ±0.5 cd/m² on the sub brightness.
   (5) Color coordinates ' adjustment of Red Offset, Green Offset, Blue Offset using this kind of method.
   Color coordination ⇒ x= 0.260 ±0.007, y=0.270 ±0.007, Y= 10.0 ±0.5 cd/m²

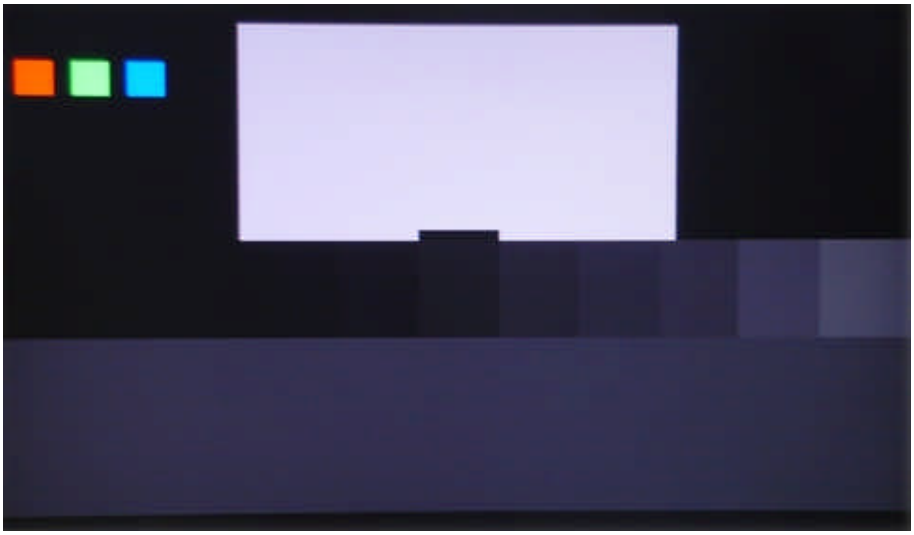
   (6) The Sub-Brightness ' readjustment when it is not satisfied with brightness after adjustment.

3) For DTV adjustment



(1) Signal Generator supply the pattern of above picture.
Timing ⇒ 395, Pattem ⇒ 251, Reverse (720P, 60Hz)
(2) After movement to 1.calibration on Factory Mode, move to sub menu as choice of volume button.
(3) After movement to 2. DTV Calibration, choose it with volume button.
(4) If Enter key, it starts the calibration.

4) For PC adjustment

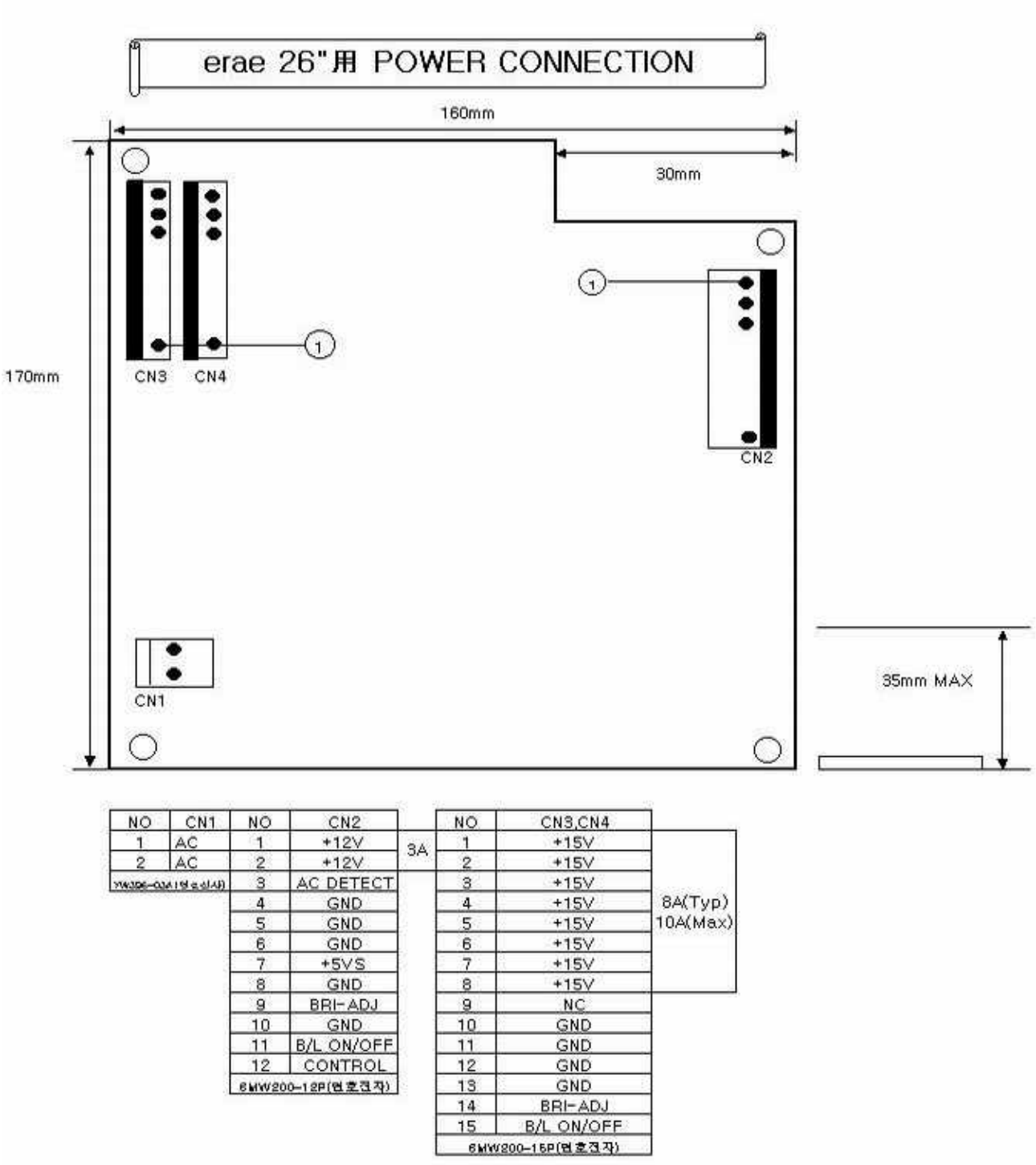


(1) Signal Generator supply the pattern of above picture.
Timing ⇒ 313, Pattem ⇒ 609 (1024 x 768, 60Hz)
(2) After movement to 1.calibration on Factory Mode, move to sub menu as choice of volume button.
(3) After movement to 2. PC Calibration, choose it with volume button.
(4) If Enter key, it starts the calibration automatically

How to exit the Factory Mode
SSM ==> PSM ==> LAST ==> ENTER Key

5) Adjustment verification
Adjustment as volume " 0 " and then 4 times of Enter key

POWER BOARD PIN CONFIGURATION



NO	CN1
1	AC
2	AC
YW396-03A(연호전자)	

NO	CN2
1	+12V
2	+12V
3	AC DETECT
4	GND
5	GND
6	GND
7	+5VS
8	GND
9	BRI-ADJ
10	GND
11	B/L ON/OFF
12	CONTROL
6MW200-12P(연호전자)	

3A

NO	CN3,CN4
1	+15V
2	+15V
3	+15V
4	+15V
5	+15V
6	+15V
7	+15V
8	+15V
9	NC
10	GND
11	GND
12	GND
13	GND
14	BRI-ADJ
15	B/L ON/OFF
6MW200-15P(연호전자)	

8A(Typ)
10A(Max)

MODULE PRECAUTIONS

1. GENERAL PRECAUTIONS

1.1 Handling

(a) When the module is assembled, It should be attached to the system firmly using every mounting holes. Be careful not to twist and bend the modules.

(b) Refrain from strong mechanical shock and / or any force to the module. In addition to damage, this may cause improper operation or damage to the module and CCFT back-light.

(c) Note that polarizers are very fragile and could be easily damaged. Do not press or scratch the surface harder than a HB pencil lead.

(d) Wipe off water droplets or oil immediately. If you leave the droplets for a long time, Staining and discoloration may occur.

(e) If the surface of the polarizer is dirty, clean it using some absorbent cotton or soft cloth.

(f) **The desirable cleaners are water, IPA(Isopropyl Alcohol) or Hexane. Do not use Ketone type materials(ex. Acetone), Ethyl alcohol, Toluene, Ethyl acid or Methyl chloride. It might permanent damage to the polarizer due to chemical reaction.**

(g) If the liquid crystal material leaks from the panel, it should be kept away from the eyes or mouth . In case of contact with hands, legs or clothes, it must be washed away thoroughly with soap.

(h) Protect the module from static , it may cause damage to the CMOS Gate Array IC.

(i) Use finger-stalls with soft gloves in order to keep display clean during the incoming inspection and assembly process.

(j) Do not disassemble the module.

(k) Do not pull or fold the lamp wire.

(l) Do not adjust the variable resistor which is located on the module.

(m) Protection film for polarizer on the module shall be slowly peeled off just before use so that the electrostatic charge can be minimized.

(n) Pins of I/F connector shall not be touched directly with bare hands.

1.2 Storage

(a) Do not leave the module in high temperature, and high humidity for a long time. It is highly recommended to store the module with temperature from 0 to 35C and relative humidity of less than 70%.

(b) Do not store the TFT-LCD module in direct sunlight.

(c) The module shall be stored in a dark place. It is prohibited to apply sunlight or fluorescent light during the store.

1.3 Operation

(a) Do not connect,disconnect the module in the "Power On" condition.

(b) Power supply should always be turned on/off by the item 6.3 "Power on/off sequence"

(c) Module has high frequency circuits. Sufficient suppression to the electromagnetic interference shall be done by system manufacturers. Grounding and shielding methods may be important to minimize the interference.

(d) The cable between the back-light connector and its inverter power supply shall be a minimized length and be connected directly . The longer cable between the back-light and the inverter may cause lower luminance of lamp(CCFT) and may require higher startup voltage(Vs).

1.4 Others

(a) Ultra-violet ray filter is necessary for outdoor operation.

(b) **Avoid condensation of water. It may result in improper operation or disconnection of electrode.**

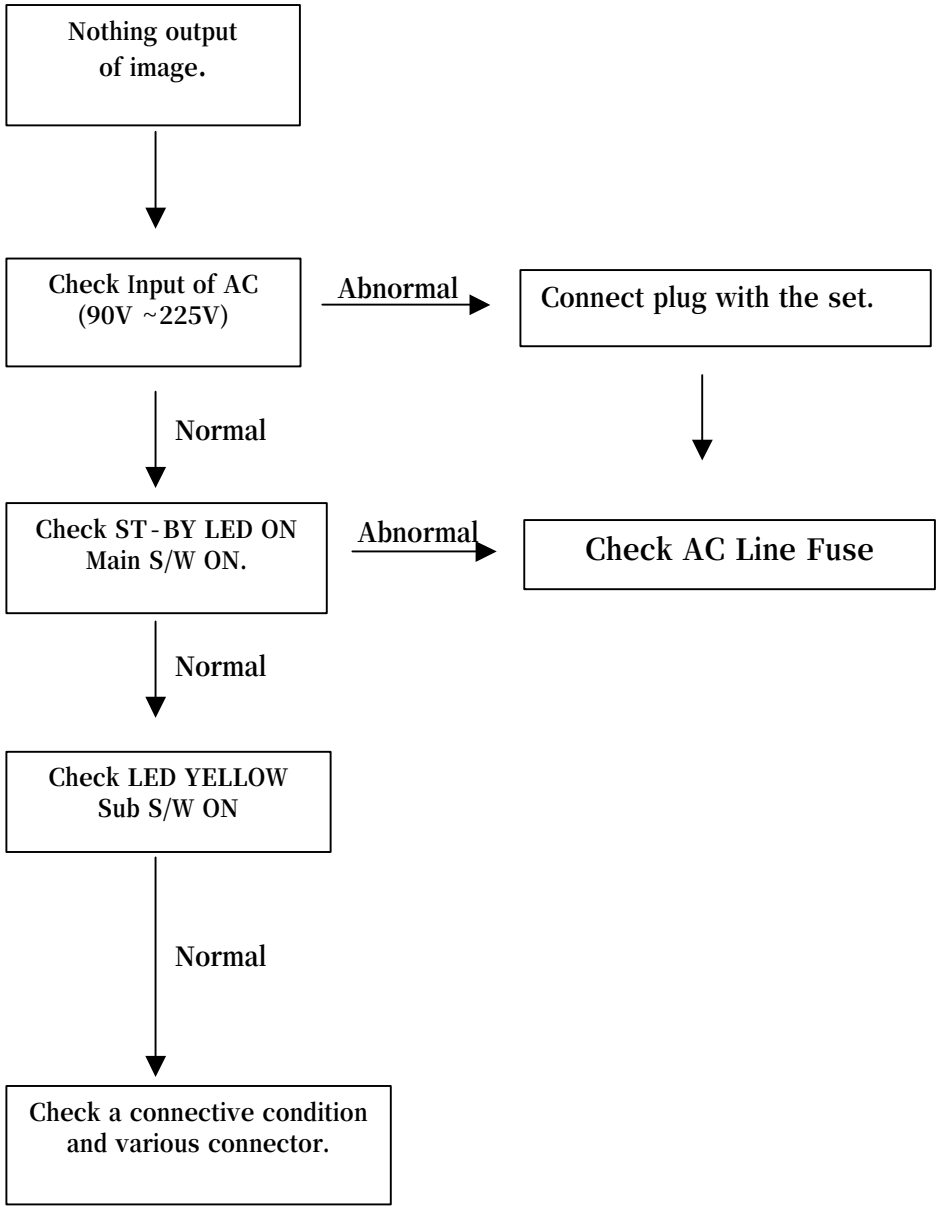
(c) Do not exceed the absolute maximum rating value. (the supply voltage variation, input voltage variation, variation in part contents and environmental temperature, and so on) Otherwise the module may be damaged.

(d) If the module displays the same pattern continuously for a long period of time,it can be the situation when the image "Sticks" to the screen.

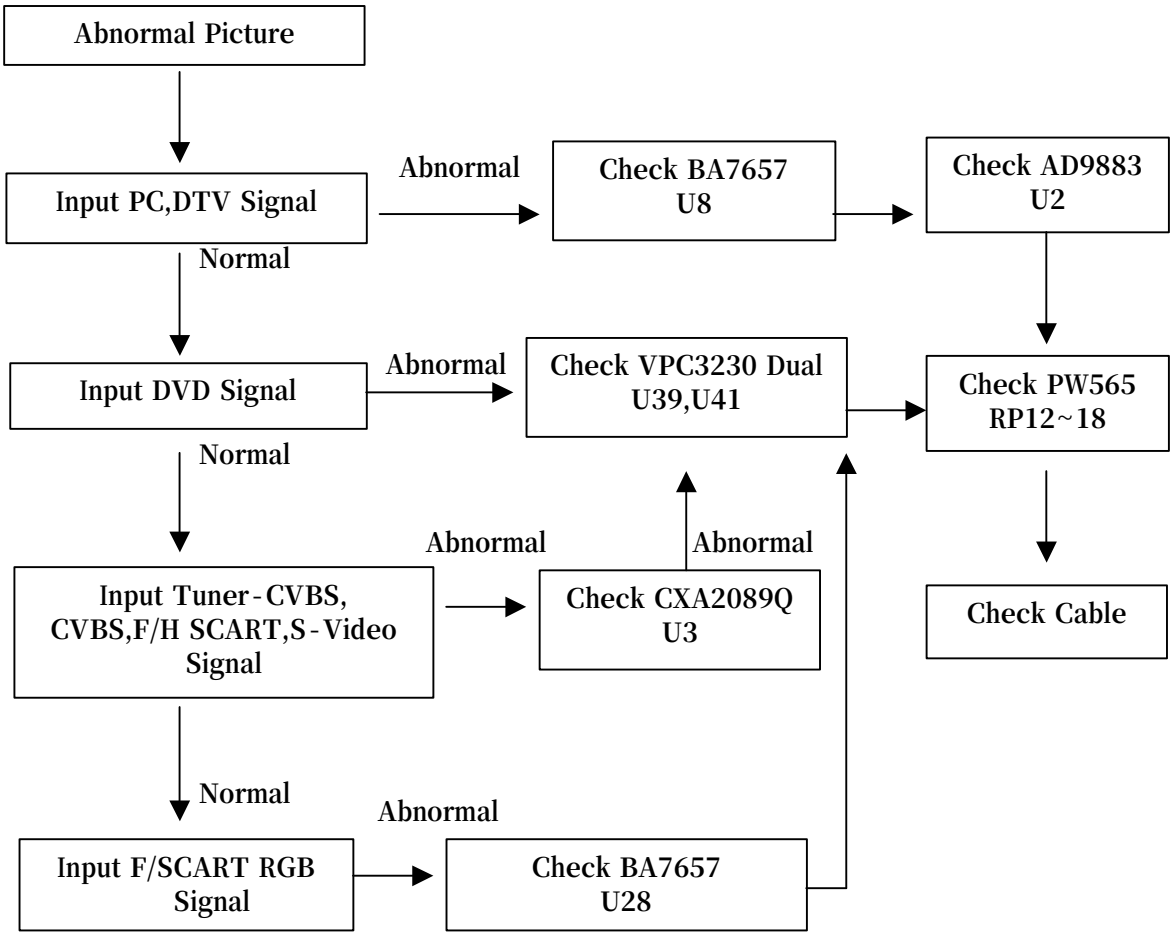
(e) This module has its circuitry PCB's on the rear side and should be handled carefully in order not to be stressed.

TROUBLE SHOOTING

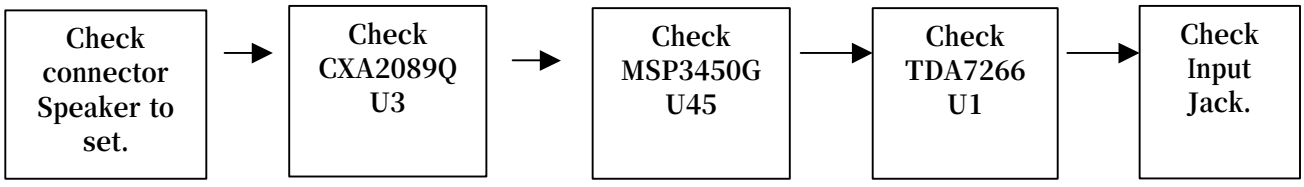
1. No Power



2. No Video



3. No Sound



EXPLODED VIEW PARTS LIST

NO	CODE NO	DESCRIPTION	SPECIFICATON
1	31-0160	PCB	E81-U004-02-PB00 REV.00
2	31-0173	PCB	E81-U004-11-PB00 REV.02
3	31-0179	PCB	E81-U004-00-PB00 REV.02
4	31-0182	PCB	E81-U004-08-PB00 REV.01(POWER S/W)
5	31-0189	PCB	E81-U004-03-PB00 REV.02(IR&LED)
6	31-0204	PCB	E81-U004-20-PB00 REV.01
7	50-0093	WIRE ASSY	POWER WIRE 12P 120MM REV.00
8	50-0100	WIRE ASSY	24PX50MM REV.00
9	50-0101	WIRE ASSY	24PX180MM REV.00
10	50-0138	WIRE ASSY	LVDS WIRE 31P 150MM(ELT-2600AP)
11	50-0140	WIRE ASSY	OSD WIRE 8P 800MM(ELT-2600AP)
12	50-0141	WIRE ASSY	AC POWER WIRE 2P 220MM(ELT-2600AP)
13	50-0145	WIRE ASSY	INVERTER WIRE 15P 150MM(ELT-2600AP)
14	50-0146	WIRE ASSY	IR WIRE 6P 410MM(ELT-2600AP)
15	54-0011	SOCKET	ID-064C-S(NOISE FILTER)
16	60-0057	26" PSU	PMR-2093AC(26" PSU)
17	60-0060	SPEAKER ASSY	ELT-2600AP
18	65-0044	LCD PANEL	LTA260W1-L02
19	66-0020	TUNER	TCPQ9091PD27D(S)
20	70AELM431	FUNCTION KNOB	ABS
21	70AELM434	POWER KNOB	ABS
22	70AELM435	STAND BASE-A	HIPS/SILVER/30"
23	70AELM492	FRONT_COVER	ABS/26" TV 인쇄 無
24	70AELM493	BACK_COVER	ABS/26" TV
25	70CELM494	KNOB GUIDE	HIPS/26"
26	70EELM466	LENS	ACRIL(MILK)
27	70HELD060	DECO PLATE	PC 0.5T
28	70HELD0751	DECO JACK	PVC 0.5T/30" TV-PAL/PC삭제
29	70HELD154	DECO_JACK_ANT	PVC 0.5T
30	71AELP266	SHIELD-B	EGI 1T/PAL用
31	71AELP271	SHIELD-A	EGI 1T/PAL用
32	71AELP2741	STAND PLATE	EGI 2T/NEW
33	71AELP328	PC CAP	EGI 1T
34	71AELP339	PCB_BRKT	EGI 1t/26"
35	71AELP340	FRAME_Y	EGI 1t/26"
36	71AELP341	FRAME_X	EGI 1t/26"

37	71AELP342	FRAME_SUPPORT	EGI 1.6t/26"
38	71BELD012	BRAND E1	AL DIACUTTING/이레 42인치 用
39	71BELP273	BRKT IN-LET	AL 1.5T
40	71BELP315	HEAT SHINK	AL 28X28X13
41	71FELP343	SHIELD_MAIN	SPTE 0.4T/26"
42	71MELP230	HEAT SINK	AL
43	71ZELP275	STAND SUPPROT	ZNDC,SPRAY
44	72AELR131	RUBBER FOOT	RUBBER (2TX50X15)
45	72RELI091	GASKET-A	120X15X30T
46	72RELI092	GASKET-B	80X15X30T
47	72RELI093	GASKET-C	90X15X30T
48	72RELI094	GASKET-D	80X30X30T
49	72RELI095	GASKET-E	40X30X15T
50	72RELI096	GASKET TAPE-A	80X30
51	72RELI097	GASKET TAPE-B	70X80
52	72SELM044	아세 테이트 TAPE	아세 테이트/10X60
53	73DELI050	INSULATION	PC,0.45t 160X36X16
54	73E10D5D12	PVC WASHER	PVC/1TX5X12
55	73EELD129	REMOCON PLATE	PVC/수출기본/신규(인쇄無)
56	73ELE089	BACK COVER CAP	PVC 0.3T
57	74A2BN3006FN	M/SCREW	BH M 3X6 ZN
58	74A2BN4006FY	M/SCREW	BH M 4X6 ZN
59	74A2BN4006FY	M/SCREW	BH M 4X6 ZN
60	74A2BN4010FB	M/SCREW	BH M 4X10 ZB
61	74A2FN3008FB	M/SCREW	FH M 3X8 ZB
62	74A2FN5008FW	M/SCREW	FH M 5X8 ZW
63	74A9BZ3006FB	M/SCREW	BH M 3X6 ZB
64	74A9BZ3008FW	M/SCREW	BH M 3X8 ZW
65	74A9BZ5012FB	M/SCREW	BH M 5X12 ZB
66	74B2BN3008FB	T/SCREW	BH T 3X8 2S ZB
67	74B2BN3010FB	T/SCREW	BH T 3X10 2S ZB
68	74B2CN3006FB	T/SCREW	BH TT 3X6 2S ZB
69	74C2BN4010FB	T/SCREW	BH TT 4X10 ZB
70	74C2FN3008FW	T/SCREW	FH TT 3X8 2S ZW
71	74GELC0016	육각볼트	4.8mm(M3)
72	74GELC0017	육각볼트	5.8mm(M3)
73	74GELM014	GRAOUND SCREW	PH M 4X6 (SPECIAL)
74	86AELB262	BOX-TOP	DW-3
75	86AELB263	BOX-BOTTOM	DW-3

76	89AELL316	SPEC LABEL	DETRON/26"
77	89CELL156	LABEL SN	ART지/50X10---인쇄 無
78	92AELV0012	POLY BAG-M	LDPE 0.08TX300X320(일반)/REV.01
79	93BELB266	PAD-L	EPE/26"
80	93BELB267	PAD-R	EPE/26"
81	97EW13	FILAMENT TAPE	10X30
82	AL-00016	SILICA-gel	200g(42", 60"PDP수출용)
83	AL-00021	수축튜브	6mm,Φ3

REPLACEMENT PARTS LIST(PAL TV)

NO	CODE NO	DESCRIPTION	SPECIFICATON
IC			
1	01-0019	IC REG	LM2937IMP-3.3 SOT-223
2	01-0020	IC REG	LM317EMP SOT-223
3	01-0034	IC	THC63LVDM83R TSOP-56
4	01-0040	IC EEPROM	24LC16B SOP-08
5	01-0041	IC EEPROM	24LC21A SOP-08
6	01-0053	IC TTL	74LCX14M SOP-14
7	01-0055	IC TTL	SN74LV273A SOP-20
8	01-0057	IC TTL	SN74LVC541A SOP-20
9	01-0059	IC REG	RC1117S33 SOT-223
10	01-0068	IC	QS3257 SOP-16
11	01-0071	IC REG	KIA7809AF D-PAK
12	01-0073	IC	K4S643232E TSSOP(II)
13	01-0088	IC REG	KIA7805AF D-PAK
14	01-0089	IC REG	KIA7808AF D-PAK
15	01-0098	IC	TDA7266 MULTI-WATT15V
16	01-0108	IC	DS232AS SO-16
17	01-0225	IC MCU	HMS87C1102AD SOP-16
18	01-0233	IC REG	AP1501-50
19	01-0234	IC	TS482 IDT SO-8
20	01-0253	IC	VPC3230D-C5 PQFP-80
21	01-0259	IC	FDC6561AN-Super SOT-6
22	01-0260	IC	MSP3450G PQFT-80
23	01-0261	IC	SST39VF080AT-TSOP40
24	01-0262	IC	SDA5550 M 3901.A14 9RF
25	01-0263	IC	HY62U8200BLLST-85I sTSOP
26	01-0264	IC	CXA2089Q
27	01-0266	IC	BA7657-SOP24
28	01-0267	IC	BA6161F-SOP8
29	01-0273	IC REG	NCP1117ST18T30
30	01-0278	IC	AD9883AKST-140
31	01-0282	IC	24LC256-SOIC8
32	01-0283	IC	AP1084K18-TO263
33	01-0284	IC	PW565_10Q_BGA
34	01-0285	IC	MT28F800B3WG-9T
35	01-0286	IC	SN74LVC139AD-SOIC16

36	01-0287	IC	SN74LVX74AD-SOIC14
37	01-0288	IC	TLC7733QD SOIC-08
38	01-0294	IC	G960T65(3.3V)
TRANSISTOR			
1	02-0012	TR	MMBT3904 SOT-23
2	02-0025	TR	KTC3875Y SOT-23
3	02-0038	TR	KSC1623Y
4	03-0001	FET	IRF7314 SOP-08
DIODE			
1	04-0005	DIODE	BAV99 SOT-23
2	04-0030	DIODE ZENER	Z02W3.3 SOT-23
3	04-0050	DIODE SCHOTTKY	1N5822 TP
4	04-0054	DIODE	KDS184
5	04-0058	DIODE ZENER	Z02W18V-Y
6	04-0125	DIODE	MMBD4148 SOT-23
7	04-0126	DIODE	RB160L-60(SOD-106)
8	04-0127	DIODE	1SR154-400
9	04-0128	DIODE	KDZ8.2EV-RTK
10	04-0129	LED	SRM3671
11	33-0002	IR RECE IVER	KSM-603TM2
CAPACITOR			
1	10-0004	CC CHIP	25V 101J 1608 TP
2	10-0009	CC CHIP	25V 330J 1608 TP
3	10-0013	CC	50V 104K
4	10-0016	CC CHIP	16V 224Z 1608 TP
5	10-0017	CC CHIP	16V 474Z 1608 TP
6	10-0021	CC CHIP	25V 102K 1608 TP
7	10-0022	CC CHIP	25V 103Z 1608 TP
8	10-0023	CC CHIP	25V 104Z 1608 TP
9	10-0024	CC CHIP	25V 180J 1608 TP
10	10-0028	CC CHIP	25V 393K 1608 TP
11	10-0029	CC CHIP	25V 473K 1608 TP
12	10-0049	CC CHIP	25V 560J 1608 TP
13	10-0050	CC CHIP	25V 391J 1608 TP
14	10-0053	CC CHIP	25V 392K 1608 TP
15	10-0054	CC CHIP	25V 331J 1608 TP
16	10-0055	CC CHIP	25V 152K 1608 TP
17	10-0057	CC CHIP	10V 684Z 1608 TP
18	10-0058	CC CHIP	25V 200J 1608 TP

19	10-0059	CC CHIP	25V 471J 1608 TP
20	10-0060	CC CHIP	25V 334Z 1608 TP
21	10-0063	CC CHIP	25V 221J 1608 TP
22	10-0180	CC CHIP	25V 682K 1608 TP
23	10-0189	CC CHIP	25V 105Z 1608 TP
24	11-0044	EC SMD	MV 16V 22UF (5X5.3) TP
25	11-0045	EC SMD	MV 16V 10UF (4X5.3) TP
26	11-0045	EC SMD	MV 16V 10UF (4X5.3) TP
27	11-0046	EC SMD	MV 16V 220UF (8X10.3) TP
28	11-0048	EC SMD	MV 16V 100UF (6.3X5.3) TP
29	11-0049	EC SMD	MV 16V 47UF (6.3X5.3) TP
30	11-0050	EC SMD	MV 50V 4.7UF (4X5.3)TP
31	11-0051	EC SMD	MV 50V 3.3UF (4X5.3)TP
32	11-0055	EC SMD	MV 50V 1UF (4X5.3) TP
33	11-0117	EC	SHL 25V 680UF (10X16)
34	11-0122	EC SMD	MV 50V 100UF(8X10)TP
35	11-0123	EC SMD	MV 16V 33UF(6.3X5)TP
36	11-0143	EC SMD	MV 25V 470UF(10X10) TP
37	11-0146	EC SMD	MV 16V 330UF (8X10)TP
38	12-0004	PC	10PS 470MJ 12 (10X12.5)
RESISTOR			
1	14-0001	R ARRAY	164P 000J TP
2	14-0003	R ARRAY	164P 470J TP
3	14-0007	R CHIP	1608 000J TP
4	14-0008	R CHIP	1608 101F TP
5	14-0010	R CHIP	1608 102F TP
6	14-0012	R CHIP	1608 103F TP
7	14-0022	R CHIP	1608 153F TP
8	14-0029	R CHIP	1608 201F TP
9	14-0030	R CHIP	1608 202F TP
10	14-0034	R CHIP	1608 223F TP
11	14-0037	R CHIP	1608 271J TP
12	14-0039	R CHIP	1608 273F TP
13	14-0043	R CHIP	1608 332F TP
14	14-0050	R CHIP	1608 470F TP
15	14-0052	R CHIP	1608 472F TP
16	14-0055	R CHIP	1608 473J TP
17	14-0058	R CHIP	1608 511F TP
18	14-0064	R CHIP	1608 562J TP

19	14-0067	R CHIP	1608 681F TP
20	14-0069	R CHIP	1608 750F TP
21	14-0107	R CHIP	1608 471F TP
22	14-0169	R CHIP	1608 131F TP
23	14-0175	R CHIP	1608 820J TP
24	14-0178	R CHIP	1608 220F TP
25	14-0179	R CHIP	1608 152F TP
26	14-0205	R CHIP	1608 683J TP
27	14-0268	R CHIP	1608 122J TP
28	14-0278	R CHIP	1608 241J TP
29	14-0309	R CHIP	1608 104F TP
30	14-0319	R CHIP	1608 363F TP
31	14-0321	R CHIP	1608 391F TP
32	14-0322	R CHIP	1608 392F TP
33	14-0462	R ARRAY	164P 750J TP
34	14-0467	R CHIP	1608 4R7F TP
35	14-0470	R CHIP	1608 132F TP
36	14-0476	R CHIP	1608 474F TP
37	14-0477	R CHIP	1608 181F TP
38	14-0479	R CHIP	1608 105F TP
39	14-0485	R CHIP	1608 224F TP
40	14-0507	R CHIP	1608 362F TP
COIL,CORE,BEAD			
1	16-0015	COIL	3.3UH (3216) 50MA
2	16-0016	COIL	10UH (10X10 SMD)1.15A
3	16-0017	COIL	33UH (12X12 SMD) 2.8A
4	16-0052	COIL	4.7mH 3DM TYPE
5	17-0003	BEAD	HB-1M2012-221JT
6	17-0004	BEAD	HH-1M3216-121JT
7	17-0023	BEAD	HCB 4516K-600T60
8	17-0034	BEAD	BLM11A601S
9	19-0007	X-TAL	6.000MHZ
10	19-0009	X-TAL	20.000MHZ
11	19-0010	X-TAL	20.250MHZ 18PF
12	19-0011	X-TAL	18.432MHZ 18PF
13	20-0001	FILTER NOISE	STS104B 2012.5 TP
14	30-0001	OSCILLATOR	80MHz(3.3V)
SWITCH			
1	22-0002	S/W TACT	KLT-1105(4.3MM)
2	22-0013	S/W AC POWER	SDDFC30300

CONNECTOR,WAFER,JACK			
1	52-0002	CONNECTOR	DHR20-15K-7100 (15PIN D-SUB R/A)
2	52-0124	CONNECTOR	MYD-09-2100010(9PIN D-SUB R/A)
3	52-0213	WAFER	SMW200-04
4	52-0217	WAFER	SMW200-06
5	52-0218	WAFER	SMW200-08
6	52-0239	WAFER	SMW200-12
7	52-0254	WAFER	GT121-21P-LD
8	52-0265	WAFER	SMAW200-06
9	52-0266	WAFER	10022HS-24A00
10	52-0268	WAFER	YAW396-03
11	52-0269	WAFER	53014-0310
12	52-0271	WAFER	GT121-31P-LD
13	53-0059	JACK	PJ6046B-04(S-VIDEO)
14	53-0060	JACK	PPJ122A-11
15	53-0061	JACK	42PS(SCART)
16	53-0062	JACK	PPJ121A-03(AUDIO)
17	53-0063	JACK	UJB-06-15F(3P)
ACCESSORIES			
1	27-0004	BATTERY	AAA Type(망간)
2	55-0023	CABLE	Scart Cable 1.2M
3	55-0027	CABLE	RF-CABLE(2 CORE/6φ)1P/2100MM
4	57-0038	P-CORD	BAHRAIN 230V/50HZ G
5	60-0046	REMOCON	TV 유럽향 신형(PAL)_031101
6	73EELD129	REMOCON PLATE	PVC/수출기본/신규(인쇄無)
7	90-X-260P-W1-EXP-00	MANUAL	ART지/26" PAL TV用
8	92AELV0012	POLY BAG-M	LDPE 0.08TX300X320(일반)/REV.01

EXPLODED VIEW

MODEL NAME	DOCUMENT NO	REVISION NO	REVISION DATE	PAGE
ELT-2600AP	RD(1)	00	04/04/02	57/57